

50	55	60
Asn Ser Ser Thr Glu Ala	Asn Val Ile Lys Glu Ala	Leu Asp Ser Ser
65	70	75
Leu Glu Ser Thr Leu Asp	Asn Ser Cys Gln Gly Ala	Gln Met Asp Asn
85	90	95
Lys Ser Glu Val Gln Leu	Trp Leu Leu Lys Arg Ile	Gln Val Pro Ile
100	105	110
Glu Asp Ile Leu Pro Ser	Lys Glu Glu Lys Ser Lys	Thr Pro Pro Met
115	120	125
Phe Leu Cys Ile Lys Val	Gly Lys Pro Met Arg Lys	Ser Phe Ala Thr
130	135	140
His Thr Ala Ala Met Val	Gln Gln Tyr Gly Lys Arg	Arg Lys Gln Pro
145	150	155
Glu Tyr Trp Phe Ala Val	Pro Arg Glu Arg Val Asp	His Leu Tyr Thr
165	170	175
Phe Phe Val Gln Trp Ser	Pro Asp Val Tyr Gly Lys	Asp Ala Lys Glu
180	185	190
Gln Gly Phe Val Val Val	Glu Lys Glu Glu Leu Asn	Met Ile Asp Asn
195	200	205
Phe Phe Ser Glu Pro Thr	Thr Lys Ser Trp Glu Ile	Ile Thr Val Glu
210	215	220
Glu Ala Lys Arg Arg Lys	Ser Thr Cys Ser Tyr Tyr	Glu Asp Glu Asp
225	230	235
Glu Glu Val Leu Pro Val	Leu Arg Pro Pro Arg Ala	Phe Trp Glu Asn
245	250	255
Lys Pro Leu Asn Arg Trp	Ala Arg Pro Phe Pro Ala	Arg Val Gln Gly
260	265	270
Tyr Pro Trp Arg Leu Ala	Tyr Ser Thr Leu Glu His	Gly Thr Ser Leu
275	280	285
Lys Thr Leu Tyr Arg Lys	Ser Ala Ser Leu Asp Ser	Pro Val Leu Leu
290	295	300
Val Ile Lys		
305		

<210> 2763

<211> 2210

<212> DNA

<213> Homo sapiens

<400> 2763

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120

caaacagtcc agtcctgcag accacacagg gtacatctag aggggttctac ttgcatcacc
180

cacacttcca ctctgtgaa acaactgtct tgggcatgag aagggccagg ataggccagg
240

tgaatggcag gctgccaac aacccaatc ccaaaccaac ctcccaggcc atgggcccac
300

gtccctgcag gaagatgcta ataggtacaa caggtagaac atgtagacac aaacatctag
360

tttatttttt ctgactgtaa ccaaagtcag caaaagaaac aacaaaactt cagtgcctta
420

gaaatcctcc tggattcaat gacaacacat caatggccgg gcacaggggt ggattccttt
480
tatgaaatca ccttataatc tctcatcatc ccaggacagt gccttttggg actgcatgaa
540
tctttaatag ctacaccaca ttttctcatc ctttaagtta tgacagacag gttatctctc
600
tccaagagca tcaggttaga tgctctttca ctcttacaaa ctgtcagggt gagggagaat
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1020
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1080
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1140
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1200
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1260
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1320
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1440
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1920
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1980
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2040

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<210> 2764
 <211> 423
 <212> PRT
 <213> Homo sapiens

<400> 2764
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 Val Ala Ser Gly Pro Val Val Gly Arg Lys Lys Val Arg Gly Pro
 35 40 45
 Glu Gln Ile Lys Gln Glu Val Glu Ser Glu Glu Glu Lys Pro Asp Arg
 50 55 60
 Met Asp Ile Asp Ser Glu Asp Thr Asp Ser Asn Thr Ser Leu Gln Thr
 65 70 75 80
 Arg Ala Arg Glu Lys Arg Lys Pro Gln Leu Glu Lys Asp Thr Lys Pro
 85 90 95
 Lys Glu Pro Arg Tyr Thr Pro Val Ser Ile Tyr Glu Glu Lys Leu Leu
 100 105 110
 Leu Lys Arg Leu Glu Ala Cys Pro Gly Ala Val Ala Met Thr Pro Glu
 115 120 125
 Ala Arg Arg Leu Lys Arg Lys Leu Ile Val Arg Gln Ala Lys Arg Asp
 130 135 140
 Arg Gly Leu Pro Leu Phe Asp Leu Asp Gln Val Val Asn Ala Ala Leu
 145 150 155 160
 Leu Leu Val Asp Gly Ile Tyr Gly Ala Lys Glu Gly Gly Ile Ser Arg
 165 170 175
 Leu Pro Ala Gly Gln Ala Thr Tyr Arg Thr Thr Cys Gln Asp Phe Arg
 180 185 190
 Ile Leu Asp Arg Tyr Gln Thr Ser Leu Pro Ser Arg Lys Gly Phe Arg
 195 200 205
 His Gln Thr Thr Lys Phe Leu Tyr Arg Leu Val Gly Ser Glu Asp Met
 210 215 220
 Ala Val Asp Gln Ser Ile Val Ser Pro Tyr Thr Ser Arg Ile Leu Lys
 225 230 235 240
 Pro Tyr Ile Arg Arg Asp Tyr Glu Thr Lys Pro Pro Lys Leu Gln Leu
 245 250 255
 Leu Ser Gln Ile Arg Ser His Leu His Arg Ser Asp Pro His Trp Thr
 260 265 270
 Pro Glu Pro Asp Ala Pro Leu Asp Tyr Cys Tyr Val Arg Pro Asn His
 275 280 285
 Ile Pro Thr Ile Asn Ser Met Cys Gln Glu Phe Phe Trp Pro Gly Ile
 290 295 300
 Asp Leu Ser Glu Cys Leu Gln Tyr Pro Asp Phe Ser Val Val Val Leu
 305 310 315 320
 Tyr Lys Lys Val Ile Ile Ala Phe Gly Phe Met Val Pro Asp Val Lys

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                325                330                335
Tyr Asn Glu Ala Tyr Ile Ser Phe Leu Phe Val His Pro Glu Trp Arg
                340                345                350
Arg Ala Gly Ile Ala Thr Phe Met Ile Tyr His Leu Ile Gln Thr Cys
                355                360                365
Met Gly Lys Asp Val Thr Leu His Val Ser Ala Ser Asn Pro Ala Met
                370                375                380
Leu Leu Tyr Gln Lys Phe Gly Phe Lys Thr Glu Glu Tyr Val Leu Asp
385                390                395                400
Phe Tyr Asp Lys Tyr Tyr Pro Leu Glu Ser Thr Glu Cys Lys His Ala
                405                410                415
Phe Phe Leu Arg Leu Arg Arg
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```

<210> 2765

<211> 582

<212> DNA

<213> Homo sapiens

<400> 2765

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120
agtggagggg caggatggca cggccacttg gggcttgggg gcgctccggc tgccgtaccg
180
tggctgcaag cctaaaccgg gcttggggccc atcctgagca gcccagggtt tggtcagctc
240
ccggcttctg gccactcggc atcgccagag tctccaggcc agcacagggc cagcgatggc
300
aagtccaaga agcaggcacc cgctgaccac cactgccccg atagttgcag aggccaggcc
360
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420
gcagagcaga ggcttctggc cagagcagtt gtctcggcgg atgtcgtgcc aggactccag
480
ggcacagtgt cagtcggcct gcaggtcaag gtcacagcgg gcggccagcg ccccatccac
540
acgagacaag gggttgcgta gcacgttcag gacctcaagc tt
582

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<210> 2766

<211> 100

<212> PRT

<213> Homo sapiens

<400> 2766

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Met Gly Arg Trp Pro Pro Ala Val Thr Leu Thr Cys Arg Pro Thr Ala
1                5                10                15
Thr Val Pro Trp Ser Pro Gly Thr Thr Ser Ala Glu Thr Thr Ala Leu
                20                25                30
Ala Arg Ser Leu Cys Ser Ala Gly Thr Gln Pro Ala Pro Ser Thr Thr
                35                40                45
Ser Leu Pro Ser Trp Arg Ser Ala Ala Pro Leu Ala Trp Pro Leu Gln

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50		55		60	
Leu Ser Gly Gln Trp	Trp Ser Ala Gly Ala Cys	Phe Leu Asp Leu Pro			
65	70	75	80		
Ser Leu Ala Leu Cys	Trp Pro Gly Asp Ser	Gly Asp Ala Glu Trp	Pro		
	85	90	95		
Glu Ala Gly Ser					
	100				

<210> 2767

<211> 1202

<212> DNA

<213> Homo sapiens

<400> 2767

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120
gactcagcct acgacagcaa cgaccctgat gtggaatcca acagcagcag tggcatcagc
180
tctcccagca ggcagcccca ggtgcccatg gccacagctg ctggcttggg tagcgcgggc
240
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300
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360
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420
ccccgggtag gctctcgttt ggaaagttag gaggtgaag acccatttcc agaggaggtc
480
ttccctgcag tgcaaggcaa aaccaagagg ccggtggacc tgaagatcaa gaacttggcc
540
ccgggttcgg tgctcccgcg ggcactggtt ctcaaagcct tctccagcag ctcgctggac
600
gcgtcctctg acagctcgcc cgtggcttct cttccagtc ccaaaagaaa tttcttcagc
660
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720
cactccatgt ctttcacctt tgcccctcac aaaaaagtgc tgaccaaaaa cctcagcgcg
780
ggctctggga aatcgcaaga ctttaccagg gaccacgtcc cgaggggtgt cagaaaggaa
840
agccagcttg ccggccgaat cgtgcaggaa aatgggtgtg aaaccacaa ccaaacagcc
900
cgcggttctt gctgagacc ccacgcctc tcggtggatg atgtgttcca gggagctgac
960
tgggagaggc ctggaagccc accctcttat gaagaggcca tgcaggggcc ggcagccaga
1020
ctagtggcct ccagcaatt tcaatttcta gcttgacact aaaatgggta tttttcagta
1080
acgggggggag aagtggggag gcagagtgtg aagggaata aaaccaatta gtaattttta
1140
actatcaaat gcactccagc aatcagtcaa aacaggcccg aggaaacctg ttccaactta
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ag

1202

<210> 2768

<211> 282

<212> PRT

<213> Homo sapiens

<400> 2768

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Met Ala Thr Ala Ala Gly Leu Asp Ser Ala Gly Pro Gln Asp Ala Arg
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Glu Val Ser Pro Glu Pro Ile Val Ser Thr Val Ala Arg Leu Lys Ser
 20          25          30
Ser Leu Ala Gln Pro Asp Arg Arg Tyr Ser Glu Pro Ser Met Pro Ser
 35          40          45
Ser Gln Glu Cys Leu Glu Ser Arg Val Thr Asn Gln Thr Leu Thr Lys
 50          55          60
Ser Glu Gly Asp Phe Pro Val Pro Arg Val Gly Ser Arg Leu Glu Ser
 65          70          75          80
Glu Glu Ala Glu Asp Pro Phe Pro Glu Glu Val Phe Pro Ala Val Gln
 85          90          95
Gly Lys Thr Lys Arg Pro Val Asp Leu Lys Ile Lys Asn Leu Ala Pro
100          105          110
Gly Ser Val Leu Pro Arg Ala Leu Val Leu Lys Ala Phe Ser Ser Ser
115          120          125
Ser Leu Asp Ala Ser Ser Asp Ser Ser Pro Val Ala Ser Pro Ser Ser
130          135          140
Pro Lys Arg Asn Phe Phe Ser Arg His Gln Ser Phe Thr Thr Lys Thr
145          150          155          160
Glu Lys Gly Lys Pro Ser Arg Glu Ile Lys Lys His Ser Met Ser Phe
165          170          175
Thr Phe Ala Pro His Lys Lys Val Leu Thr Lys Asn Leu Ser Ala Gly
180          185          190
Ser Gly Lys Ser Gln Asp Phe Thr Arg Asp His Val Pro Arg Gly Val
195          200          205
Arg Lys Glu Ser Gln Leu Ala Gly Arg Ile Val Gln Glu Asn Gly Cys
210          215          220
Glu Thr His Asn Gln Thr Ala Arg Gly Phe Cys Leu Arg Pro His Ala
225          230          235          240
Leu Ser Val Asp Asp Val Phe Gln Gly Ala Asp Trp Glu Arg Pro Gly
245          250          255
Ser Pro Pro Ser Tyr Glu Glu Ala Met Gln Gly Pro Ala Ala Arg Leu
260          265          270
Val Ala Ser Gln Gln Phe Gln Phe Leu Ala
275          280

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<210> 2769

<211> 1286

<212> DNA

<213> Homo sapiens

<400> 2769

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 180
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 240
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 300
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 360
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 420
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 480
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 720
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 780
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 1286

<210> 2770

<211> 228

<212> PRT

<213> Homo sapiens

<400> 2770

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Ala	Glu	Lys	Val	Glu	Ala	Leu	Pro	Glu	Gln	Val	Ala	Pro	Glu	Ser	Arg
			20					25					30		
Asn	Arg	Ile	Arg	Val	Arg	Gln	Asp	Leu	Ala	Ser	Leu	Pro	Ala	Glu	Leu

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 780
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 840
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 1020
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 1560
 gcacattctt actcagtttt tttctctgt cctacgtgtc ttccctcact ccccttctcc
 1620
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 1668

<210> 2772

<211> 258

<212> PRT

<213> Homo sapiens

<400> 2772

Val	Ile	Cys	Met	Trp	Gln	Gly	Cys	Ala	Val	Glu	Arg	Pro	Val	Gly	Arg
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Met	Thr	Ser	Gln	Thr	Pro	Leu	Pro	Gln	Ser	Pro	Arg	Pro	Arg	Arg	Pro
		20						25					30		
Thr	Met	Ser	Thr	Val	Val	Glu	Leu	Asn	Val	Gly	Gly	Glu	Phe	His	Thr
	35					40						45			
Thr	Thr	Leu	Gly	Thr	Leu	Arg	Lys	Phe	Pro	Gly	Ser	Lys	Leu	Ala	Glu
	50				55						60				
Met	Phe	Ser	Ser	Leu	Ala	Lys	Ala	Ser	Thr	Asp	Ala	Glu	Gly	Arg	Phe
65				70					75					80	
Phe	Ile	Asp	Arg	Pro	Ser	Thr	Tyr	Phe	Arg	Pro	Ile	Leu	Asp	Tyr	Leu
		85						90					95		
Arg	Thr	Gly	Gln	Val	Pro	Thr	Gln	His	Ile	Pro	Glu	Val	Tyr	Arg	Glu

	100		105		110										
Ala	Gln	Phe	Tyr	Glu	Ile	Lys	Pro	Leu	Val	Lys	Leu	Leu	Glu	Asp	Met
	115						120				125				
Pro	Gln	Ile	Phe	Gly	Glu	Gln	Val	Ser	Arg	Lys	Gln	Phe	Leu	Leu	Gln
	130						135				140				
Val	Pro	Gly	Tyr	Ser	Glu	Asn	Leu	Glu	Leu	Met	Val	Arg	Leu	Ala	Arg
145					150					155				160	
Ala	Glu	Ala	Ile	Thr	Ala	Arg	Lys	Ser	Ser	Val	Leu	Val	Cys	Leu	Val
				165						170				175	
Glu	Thr	Glu	Glu	Gln	Asp	Ala	Tyr	Tyr	Ser	Glu	Val	Leu	Cys	Phe	Leu
			180							185			190		
Gln	Asp	Lys	Lys	Met	Phe	Lys	Ser	Val	Val	Lys	Phe	Gly	Pro	Trp	Lys
	195						200				205				
Ala	Val	Leu	Asp	Asn	Ser	Asp	Leu	Met	His	Cys	Leu	Glu	Met	Asp	Ile
	210					215					220				
Lys	Ala	Gln	Gly	Tyr	Lys	Val	Phe	Ser	Lys	Phe	Tyr	Leu	Thr	Tyr	Pro
225					230					235				240	
Thr	Lys	Arg	Asn	Glu	Phe	His	Phe	Asn	Ile	Tyr	Ser	Phe	Thr	Phe	Thr
			245						250					255	

Trp Trp

<210> 2773

<211> 593

<212> DNA

<213> Homo sapiens

<400> 2773

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 120
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 180
 aaagtggccg tgaaagccaa gccctcgccc cggtcacca tctttgacga ggaggtggac
 240
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 300
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 360
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 420
 agccacaggg acgcctccaa ggaactgttc agacaaattc aaaaagagcc gtaacactgg
 480
 gattagcttc ttgagagcag gaaccacatt cattctttgt gtctgccctg tgactatcca
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 593

<210> 2774

<211> 157

<212> PRT

<213> Homo sapiens

<400> 2774

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 20 25 30
 Glu Asp Ala Glu Glu Ser Leu Glu Glu Glu Ala Leu Asp Pro Leu
 35 40 45
 Gly Ile Met Arg Ser Lys Lys Pro Lys Lys His Pro Lys Val Ala Val
 50 55 60
 Lys Ala Lys Pro Ser Pro Arg Leu Thr Ile Phe Asp Glu Glu Val Asp
 65 70 75 80
 Pro Asp Glu Gly Leu Phe Gly Pro Gly Arg Lys Leu Ser Pro Gln Asp
 85 90 95
 Pro Ser Glu Asp Val Ser Ser Met Asp Pro Leu Lys Leu Phe Asp Asp
 100 105 110
 Pro Asp Leu Gly Gly Ala Ile Pro Leu Gly Asp Ser Leu Leu Leu Pro
 115 120 125
 Ala Ala Cys Glu Ser Gly Gly Pro Thr Pro Ser Leu Ser His Arg Asp
 130 135 140
 Ala Ser Lys Glu Leu Phe Arg Gln Ile Gln Lys Glu Pro
 145 150 155

<210> 2775

<211> 3139

<212> DNA

<213> Homo sapiens

<400> 2775

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 180
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 240
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<212> PRT

<213> Homo sapiens

<400> 2778

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<213> Homo sapiens

<400> 2779

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<211> 720

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<213> Homo sapiens

<400> 2780

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<211> 1268

<212> DNA

<213> Homo sapiens

<400> 2781

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Ala	Arg	Thr	Gly	Leu	Arg	Ile	Cys	Asp	Leu	Leu	Ser	Asp	Phe	Asp	Glu
		35					40					45			
Phe	Ser	Ser	Arg	Phe	Lys	Asn	Leu	Ala	His	Gln	His	Gln	Ser	Met	Phe
	50					55				60					
Pro	Thr	Leu	Glu	Ile	Asp	Ile	Glu	Gly	Gln	Leu	Lys	Arg	Leu	Lys	Gly
65					70				75					80	
Phe	Ala	Glu	Arg	Ile	Arg	Pro	Met	Val	Arg	Asp	Gly	Val	Tyr	Phe	Met
				85				90						95	
Tyr	Glu	Ala	Leu	His	Gly	Pro	Pro	Lys	Lys	Ile	Leu	Val	Glu	Gly	Ala
			100					105					110		
Asn	Ala	Ala	Leu	Leu	Asp	Ile	Asp	Phe	Gly	Thr	Tyr	Pro	Phe	Val	Thr
		115					120					125			
Ser	Ser	Asn	Cys	Thr	Val	Gly	Gly	Val	Cys	Thr	Gly	Leu	Gly	Ile	Pro
		130					135				140				
Pro	Gln	Asn	Ile	Gly	Asp	Val	Tyr	Gly	Val	Val	Lys	Ala	Tyr	Thr	Thr
145					150				155					160	
Arg	Val	Gly	Ile	Gly	Ala	Phe	Pro	Thr	Glu	Gln	Ile	Asn	Glu	Ile	Gly
				165				170						175	
Gly	Leu	Leu	Gln	Thr	Arg	Gly	His	Glu	Trp	Gly	Val	Thr	Thr	Gly	Arg
			180				185					190			
Lys	Arg	Arg	Cys	Gly	Trp	Leu	Asp	Leu	Met	Ile	Leu	Arg	Tyr	Ala	His
		195					200					205			
Met	Val	Asn	Gly	Phe	Thr	Ala	Leu	Ala	Leu	Thr	Lys	Leu	Asp	Ile	Leu
	210					215					220				
Asp	Val	Leu	Gly	Glu	Val	Lys	Val	Gly	Val	Ser	Tyr	Lys	Leu	Asn	Gly
225					230				235					240	
Lys	Arg	Ile	Pro	Tyr	Phe	Pro	Ala	Asn	Gln	Glu	Met	Leu	Gln	Lys	Val
			245					250						255	
Glu	Val	Glu	Tyr	Glu	Thr	Leu	Pro	Gly	Trp	Lys	Ala	Asp	Thr	Thr	Gly
		260					265						270		
Ala	Arg	Arg	Trp	Glu	Asp	Leu	Pro	Pro	Gln	Ala	Gln	Asn	Tyr	Ile	Arg
		275					280					285			
Phe	Val	Glu	Asn	His	Val	Gly	Val	Ala	Val	Lys	Trp	Val	Gly	Val	Gly

290 295 300
 Lys Ser Arg Glu Ser Met Ile Gln Leu Phe
 305 310

<210> 2783
 <211> 2376
 <212> DNA
 <213> Homo sapiens

<400> 2783
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 120
 gttgatgtag aagattatta cccagctttc ctggacatgg tgcggagcct gctggatggc
 180
 aacatagact catcacagta tgaagattca ctgagagaga tgttcacat tcatgcctac
 240
 attgccttta ccatggacaa actgatccag agcattgtca gacagctgca gcatatcgtg
 300
 agtgatgaga tctgtgtgca ggtgactgac ctttacctgg cagaaaataa taatggggcc
 360
 accggaggcc agctgaacac acagaactca aggagcctcc tggagtcaac gtatcagcgg
 420
 aaagctgagc agctaattgc agatgagaat tgctttaagc ttatgtttat tcagagccaa
 480
 ggccaggctc agctgactat tgagcttctg gacacagaag aggagaattc ggatgacct
 540
 gtggaagcag agcgtctgtc agactacgtg gagcgataca tgaattcaga tactacctg
 600
 cctgagcttc gtgaacatct agcacagaaa ccagtatttc tccccaggaa tctacggcgg
 660
 atccggaagt gtcaacgtgg tcgagagcag caggaaaagg aagggaagga aggaaacagc
 720
 aagaagacca tggagaatgt ggatagtctg gataagctgg agtgtagatt caagctgaat
 780
 tcctacaaga tgggtgatgt gatcaaata gaggactata tgtatcggag gaccgcctg
 840
 ctccgggctc atcagtccca tgagcgtgta agcaagcgtc tacatcagag attccaggcc
 900
 tgggtagata aatggaccaa ggagcatgtg ccccgtagaa tggcagcaga gaccagcaag
 960
 tggctcatgg gtgaggggct ggagggcctg gtgccctgta ccaccacctg tgatacagag
 1020
 accctgcatt ttgtgagcat taacaagtat cgtgtcaaata acggcacagt attcaaagcc
 1080
 ccttaactgc aaagccagag cagataactt ggggtgtgtg tggggatgtg tgtgtgggc
 1140
 tatgcactca cacactgaag aaacaaggaa gatgcctttc aagcctcact gggcctctct
 1200
 gggacatggc cacctgacct gtgtgtggct ggtgcagcct ggcaaccaagt gggctacctg
 1260
 ttaggaacat gaatacctta caaagctgaa gctggaactt ttcccaaagg gttttgggta
 1320

tagcctgccc tggaggggaa ggaagtccat gcaagcaaag acatgcagtt tgcttgacaca
 1380
 caccagcaga gctaagactg gagtctcctg tggcctaact ttcaatgagg gaaccggatg
 1440
 ctgttcacac tttgactgga tggagatgca tttacaaaac agactggaga aggacttaat
 1500
 actcagatgg attggaacta tcatggtcac tgctcctctc ccctccccac aaaaggaaaa
 1560
 aaaagctgga tttgattttt tttttctggt cactcgagca catctaagat caccattag
 1620
 gttttatctg ggacctgcag tttggctttg ggattgatca tcttgtggat tttattcctg
 1680
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 1740
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 1800
 ttagtgccat ccaccagctt tactctctga cacacacacg cacacacaca cacacaattt
 1860
 taacttgttt ttttgtacat aatgtacata ctgtcaattt tttattaaaa gaaatatgct
 1920
 ttgatgtgct agcataactg ctctagcttc ttgtgtacca tagtactgtg gcttcagatt
 1980
 tagtacctat gaacagatgt acaagacatt tattacactt tttaccaaag ggagttacca
 2040
 ttgtagtact tttgtgtaaa acttgtcttc ccctttgccc ccaacttttt tttttttttt
 2100
 ttgtaaataa ataaagcttg gttcttactt aaggaaaaaa ctctcaaccc acgtcccttg
 2160
 tcctcaccag aaaatactgt gaagcagga ttttgacttc agttccttat ccagggtaga
 2220
 aacaggattt tgcttaaaat acttgttact tgtcccaaat caaaatattc caaaatctta
 2280
 gaatacttaa gtcttttagt acgtgttttt ttccttggtt caaataatct gaaaatattt
 2340
 tatatttggg taagttgtca agctatgtag tttgta
 2376

<210> 2784

<211> 361

<212> PRT

<213> Homo sapiens

<400> 2784

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Glu	Val	Leu	Gly	Ile	Lys	Arg	Asp	Lys	Ser	Asp	Ser	Pro	Ala	Ile	Gln
			20					25					30		
Leu	Arg	Leu	Lys	Glu	Pro	Met	Asp	Val	Asp	Val	Glu	Asp	Tyr	Tyr	Pro
			35				40				45				
Ala	Phe	Leu	Asp	Met	Val	Arg	Ser	Leu	Leu	Asp	Gly	Asn	Ile	Asp	Ser
			50			55				60					
Ser	Gln	Tyr	Glu	Asp	Ser	Leu	Arg	Glu	Met	Phe	Thr	Ile	His	Ala	Tyr
65					70				75					80	
Ile	Ala	Phe	Thr	Met	Asp	Lys	Leu	Ile	Gln	Ser	Ile	Val	Arg	Gln	Leu

				85					90					95					
Gln	His	Ile	Val	Ser	Asp	Glu	Ile	Cys	Val	Gln	Val	Thr	Asp	Leu	Tyr				
			100					105					110						
Leu	Ala	Glu	Asn	Asn	Asn	Gly	Ala	Thr	Gly	Gly	Gln	Leu	Asn	Thr	Gln				
		115					120					125							
Asn	Ser	Arg	Ser	Leu	Leu	Glu	Ser	Thr	Tyr	Gln	Arg	Lys	Ala	Glu	Gln				
	130					135					140								
Leu	Met	Ser	Asp	Glu	Asn	Cys	Phe	Lys	Leu	Met	Phe	Ile	Gln	Ser	Gln				
145					150					155					160				
Gly	Gln	Val	Gln	Leu	Thr	Ile	Glu	Leu	Leu	Asp	Thr	Glu	Glu	Glu	Asn				
			165					170						175					
Ser	Asp	Asp	Pro	Val	Glu	Ala	Glu	Arg	Trp	Ser	Asp	Tyr	Val	Glu	Arg				
	180							185				190							
Tyr	Met	Asn	Ser	Asp	Thr	Thr	Ser	Pro	Glu	Leu	Arg	Glu	His	Leu	Ala				
	195						200					205							
Gln	Lys	Pro	Val	Phe	Leu	Pro	Arg	Asn	Leu	Arg	Arg	Ile	Arg	Lys	Cys				
	210					215					220								
Gln	Arg	Gly	Arg	Glu	Gln	Gln	Glu	Lys	Glu	Gly	Lys	Glu	Gly	Asn	Ser				
225					230					235					240				
Lys	Lys	Thr	Met	Glu	Asn	Val	Asp	Ser	Leu	Asp	Lys	Leu	Glu	Cys	Arg				
			245					250						255					
Phe	Lys	Leu	Asn	Ser	Tyr	Lys	Met	Val	Tyr	Val	Ile	Lys	Ser	Glu	Asp				
	260						265					270							
Tyr	Met	Tyr	Arg	Arg	Thr	Ala	Leu	Leu	Arg	Ala	His	Gln	Ser	His	Glu				
	275					280					285								
Arg	Val	Ser	Lys	Arg	Leu	His	Gln	Arg	Phe	Gln	Ala	Trp	Val	Asp	Lys				
	290					295					300								
Trp	Thr	Lys	Glu	His	Val	Pro	Arg	Glu	Met	Ala	Ala	Glu	Thr	Ser	Lys				
305					310					315					320				
Trp	Leu	Met	Gly	Glu	Gly	Leu	Glu	Gly	Leu	Val	Pro	Cys	Thr	Thr	Thr				
			325					330						335					
Cys	Asp	Thr	Glu	Thr	Leu	His	Phe	Val	Ser	Ile	Asn	Lys	Tyr	Arg	Val				
	340							345					350						
Lys	Tyr	Gly	Thr	Val	Phe	Lys	Ala	Pro											
	355						360												

<210> 2785

<211> 492

<212> DNA

<213> Homo sapiens

<400> 2785

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60

tgatgacatg caccctgcag cagccgggat ggcagacggg gtccacctcc tagggttctc
120

tgatgagatc ctccttcaca tcctgagtca cgtccccagc acagatctga ttctgaacgt
180

ccggcgtacc tgtcggaagc ttgcagccct gtgccttgac aagagcctca tccacaccgt
240

gttgctgcaa aaggactatc aggcgagcga ggacaaagtg aggcagctgg tgaaggagat
300

cggccgggag atccagcagc tgagcatggc tggctgctac tggctgcctg gctccaccgt
360

ggaacacgtg gcccgctgcc cgcagcctgg tgaaggtgaa cctctcgggc tgccacctca
 420
 cttccctgcg cctctacaag atgctctcgg ccctgcagca cctgcgctcg ctggccatcg
 480
 acgtgagccc cg
 492

<210> 2786
 <211> 155
 <212> PRT
 <213> Homo sapiens

<400> 2786
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 1 5 10 15
 Pro Ala Ala Ala Gly Met Ala Asp Gly Val His Leu Leu Gly Phe Ser
 20 25 30
 Asp Glu Ile Leu Leu His Ile Leu Ser His Val Pro Ser Thr Asp Leu
 35 40 45
 Ile Leu Asn Val Arg Arg Thr Cys Arg Lys Leu Ala Ala Leu Cys Leu
 50 55 60
 Asp Lys Ser Leu Ile His Thr Val Leu Leu Gln Lys Asp Tyr Gln Ala
 65 70 75 80
 Ser Glu Asp Lys Val Arg Gln Leu Val Lys Glu Ile Gly Arg Glu Ile
 85 90 95
 Gln Gln Leu Ser Met Ala Gly Cys Tyr Trp Leu Pro Gly Ser Thr Val
 100 105 110
 Glu His Val Ala Arg Cys Pro Gln Pro Gly Glu Gly Glu Pro Leu Gly
 115 120 125
 Leu Pro Pro His Phe Pro Ala Pro Leu Gln Asp Ala Leu Gly Pro Ala
 130 135 140
 Ala Pro Ala Leu Ala Gly His Arg Arg Glu Pro
 145 150 155

<210> 2787
 <211> 299
 <212> DNA
 <213> Homo sapiens

<400> 2787
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 atgtggggag aagagccgta ctctgacata tcagttgcta aaacacgtgc agggcatgcc
 120
 acaatgcaca gacatggcag tacccttctg gtgggaggga gtcaccattt gctctgcctt
 180
 gccctctgct gggtgctctt acaggtgcta ctgcatccag cgcttgaaac aattctgtgg
 240
 ggtattgatt ctgaagagat cactgatggc cgtgatttct tgcctcagct taccagat
 299

<210> 2788
 <211> 95
 <212> PRT

<213> Homo sapiens

<400> 2788

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Met Thr Arg Asp Ser Gly Met Lys Gln Lys His Ala Ala Ser Thr Ser
 1             5             10             15
Met Trp Gly Glu Glu Pro Tyr Ser Asp Ile Ser Val Ala Lys Thr Arg
             20             25             30
Ala Gly His Ala Thr Met His Arg His Gly Ser Ile Leu Leu Val Gly
             35             40             45
Gly Ser His His Leu Leu Cys Pro Ala Leu Cys Trp Val Leu Leu Gln
             50             55             60
Val Leu Leu His Pro Ala Leu Glu Thr Ile Leu Trp Gly Ile Asp Ser
65             70             75             80
Glu Glu Ile Thr Asp Gly Arg Asp Phe Leu Pro Gln Leu Thr Gln
             85             90             95

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<210> 2789

<211> 492

<212> DNA

<213> Homo sapiens

<400> 2789

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nggaccccag ctgctccttt ttgaaggaaa tctgctcgct cagggagtcg atgcggccga
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gctgctggaa ggagtgcacc aggaggctgc cgggggtccgg gagcccatgc tccagtgcct
120
gcgaggccag gctgtgcagt ggggccagca ccagctgcag cttctcctcc agcaggtcca
180
ccctggactg cagcctctgc acttcttctt tcattgcact gtccactcct gcgggcagag
240
ccaggcgctg ggtcacggcc ggccggctcc ccacccacac ccccagggtt ccctcctgtc
300
cccagggaga ggcagagcca gaagactcag gcccaggcct ctgccacccc cgctgcctgc
360
ctggcgctgg ccagaggtct caggctatgc cgcctaagta cgtcggggcg ggtggctctg
420
cgcagaggct caggggtccc gccacgctga gggagggtcaa ggctgaggtc tcagcggccc
480
tcgttccgaa tt
492

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<210> 2790

<211> 141

<212> PRT

<213> Homo sapiens

<400> 2790

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Arg Lys Ser Ala Arg Ser Gly Ser Arg Cys Gly Arg Ala Ala Gly Arg
 1             5             10             15
Ser Ala Pro Gly Gly Cys Arg Gly Pro Gly Ala His Ala Pro Val Pro
             20             25             30
Ala Arg Pro Gly Cys Ala Val Gly Pro Ala Pro Ala Ala Ala Ser Pro
             35             40             45
Pro Ala Gly Pro Pro Trp Thr Ala Ala Ser Ala Leu Leu Pro Ser Leu

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50	55	60
His Cys Pro Leu Leu Arg Ala Glu Pro Gly Ala Gly Ser Arg Pro Ala		
65	70	75
Gly Ser Pro Pro Thr Pro Pro Gly Leu Pro Pro Val Pro Arg Glu Arg		80
	85	90
Gln Ser Gln Lys Thr Gln Ala Gln Ala Ser Ala Thr Pro Ala Ala Cys		95
	100	105
Leu Ala Leu Ala Arg Gly Leu Arg Leu Cys Arg Leu Ser Thr Ser Gly		110
	115	120
Arg Val Ala Leu Arg Arg Gly Ser Gly Ser Arg Pro Arg		125
	130	135
		140

<210> 2791

<211> 1271

<212> DNA

<213> Homo sapiens

<400> 2791

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atagaggact ggataatata tttgtgtctt tctacatagt ggtatagaaa tatcagggtcc
120
ccaaattccc atttttcttc caatcacatt taaaatttca atatgttgca ggcagtatgt
180
gtaagattat atccaaatat ttactcctgg ttgctcctct tgggcaagct gtgaatatga
240
tcaaaatatt taaagaagga agaaggtaaa gatctaaaat atgacatgaa aatacccaga
300
gaagtgtgcc taaattagca ttagggtttg agggatccta aggatgacaa aaagggactc
360
ttctattgaa ttcgtgggtg atgctcagcg atagtaacia tctgcctcc cctaacatct
420
tcttccccct ccagcagctt cacagaacat ggttgatgag gtaacttagg ggatgcacag
480
ggtgtggcca gaagaccctt ttccctatag accactatga gccctgaaag atttatgagg
540
taatgttcac ttcactcctgt gcttcttttc ctagatgtga actatgaaga ctttactttc
600
accataccag atgtagagga ctcaagtcag agaccagatc agggacccca gagacctcct
660
cctgaaggac tcctacctag accccctggg gatagtggta accaagatga tggtcctcag
720
cagagaccac caaaaccagg aggccatcac cgccatcctc cccacctcc ttttcaaaat
780
cagcaacgac caccccaacg aggacaccgt caactctctc taccctgatt tccttctgtc
840
agcctgcagg aagcatcatc attcttccgg agggacagac cagcaagaca tccccaggag
900
caaccactct ggtaatctag aattcagtgg cagaaaataa ataagaagat aacttccttc
960
agaaagccat gacattgaaa taatgtggtc ataactcttt cttcagtata ccaataaaat
1020
attaatagca tgcggaagaa agaatggttt gcattccatc ggagagtgtg ccatttagag
1080

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gtaacagggg gaggagaggg tgtgccatca agaggcaaca tggaggtgtt tcaaacctat
 1140
 gcatcttggt ataaatatat ctttgctcac atgaatttta cttgttaatt agcctggctg
 1200
 ggggtgaatgg taacaggaga gaaatggaag agaatagggg gcaactgcgcc agcattaaca
 1260
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 1271

<210> 2792

<211> 123

<212> PRT

<213> Homo sapiens

<400> 2792

Cys	Ser	Leu	His	Pro	Val	Leu	Leu	Phe	Leu	Asp	Val	Asn	Tyr	Glu	Asp
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Phe	Thr	Phe	Thr	Ile	Pro	Asp	Val	Glu	Asp	Ser	Ser	Gln	Arg	Pro	Asp
			20					25					30		
Gln	Gly	Pro	Gln	Arg	Pro	Pro	Pro	Glu	Gly	Leu	Leu	Pro	Arg	Pro	Pro
		35					40					45			
Gly	Asp	Ser	Gly	Asn	Gln	Asp	Gly	Pro	Gln	Gln	Arg	Pro	Pro	Lys	
	50					55					60				
Pro	Gly	Gly	His	His	Arg	His	Pro	Pro	Pro	Pro	Phe	Gln	Asn	Gln	
65					70					75				80	
Gln	Arg	Pro	Pro	Gln	Arg	Gly	His	Arg	Gln	Leu	Ser	Leu	Pro	Arg	Phe
				85					90					95	
Pro	Ser	Val	Ser	Leu	Gln	Glu	Ala	Ser	Ser	Phe	Phe	Arg	Arg	Asp	Arg
			100					105						110	
Pro	Ala	Arg	His	Pro	Gln	Glu	Gln	Pro	Leu	Trp					
			115				120								

<210> 2793

<211> 847

<212> DNA

<213> Homo sapiens

<400> 2793

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 120
 tgaggcgggc gcgctcactgc caggaaacaa cccaacagt cagcgcgccg gcggccgcgg
 180
 cgccctgag agctgactct gcagctgagg tagagagaca acgatcagga accctaagaa
 240
 gaggcgccag aggagccgcc ttctgctca gaacggcgtg actcggagaa ttggagcgtt
 300
 attcagtata ttaatgtctt attgataatg gcagaacatc caccactact ggatacaact
 360
 cagatcttaa gtagtgatat ttctcttttg tctgcccta ttgtaagtgc agatggaaca
 420
 caacaggtta ttctgttaca agttaacca ggagaagcat ttacaataag aagagaagat
 480

ggacagtttc agtgcattac aggtcctgct caggttccaa tgatgtcccc aaatggttct
 540
 gtgcctccta tctatgtgcc tcctggatat gcccacacagg ttattgaaga caatgggtgtt
 600
 cgaagagttg tcgtggtecc tcaggcacca gagtttcacc ctggtagtca cacagttctc
 660
 caccgttctc cacatctctc tctacctggt ttcattctctg tcccaactat gatgccgcct
 720
 caccacgtca tatgtactca cccgtgactg gagctggaga catgacaaca cagtatatgc
 780
 cncagtatca gtcttcacaa gtctatggag atgtagatgc tcactctaca catggccctt
 840
 caccgct
 847

<210> 2794

<211> 139

<212> PRT

<213> Homo sapiens

<400> 2794

Met	Ala	Glu	His	Pro	Pro	Leu	Leu	Asp	Thr	Thr	Gln	Ile	Leu	Ser	Ser
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Asp	Ile	Ser	Leu	Leu	Ser	Ala	Pro	Ile	Val	Ser	Ala	Asp	Gly	Thr	Gln
		20						25					30		
Gln	Val	Ile	Leu	Val	Gln	Val	Asn	Pro	Gly	Glu	Ala	Phe	Thr	Ile	Arg
		35					40					45			
Arg	Glu	Asp	Gly	Gln	Phe	Gln	Cys	Ile	Thr	Gly	Pro	Ala	Gln	Val	Pro
		50					55				60				
Met	Met	Ser	Pro	Asn	Gly	Ser	Val	Pro	Pro	Ile	Tyr	Val	Pro	Pro	Gly
65					70					75					80
Tyr	Ala	Pro	Gln	Val	Ile	Glu	Asp	Asn	Gly	Val	Arg	Arg	Val	Val	Val
				85					90					95	
Val	Pro	Gln	Ala	Pro	Glu	Phe	His	Pro	Gly	Ser	His	Thr	Val	Leu	His
			100						105				110		
Arg	Ser	Pro	His	Pro	Pro	Leu	Pro	Gly	Phe	Ile	Pro	Val	Pro	Thr	Met
		115					120					125			
Met	Pro	Pro	His	His	Val	Ile	Cys	Thr	His	Pro					
		130					135								

<210> 2795

<211> 1022

<212> DNA

<213> Homo sapiens

<400> 2795

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 ccaatgacca ccagcaccac gaagagcgtg ccgtagtcgc tgcgcacctg gctggcccgc
 120
 gcctggcagc tgctggttgt ggaatagttc tggatgccaa tctcctccag gctcctgcgg
 180
 atgtcaccca gcatggaaag gacatcttga gtgggcacca cccctgctc gccaccagt
 240

gtcattgagaa ggtgctgctc cttctcgctg ggcttgctca gagagatgtg ccaggcccca
 300
 tggtagggcac tgccatggcg gggcagcacc tcttccacca gggccaggag ctgtggcccc
 360
 cggtagctgcc ggaacacctc acagtctatg ttctctgtca tgttcagaat gatgtagttt
 420
 ttcccagcca gattgctcca gtccttgtag atcacctgcg tagaatcca gggtagcctg
 480
 gattgagctt cagctgcctg cccttctagg agctgctggg tgagatcttc ttgtcccaag
 540
 gtagcagagg aagggtgtcag ttccatgtct ccaggggcca gtggggaaga ggctgaggtt
 600
 ctagagccaa ggggatcttc atctgggtgc tcggcccccac tgggagctgt ggtttgaggg
 660
 aatgaaggca aggccggcac ctctctgtgc tggccagaca aaccagctgc tctgcagtg
 720
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 780
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 900
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 1020
 gt
 1022

<210> 2796

<211> 56

<212> PRT

<213> Homo sapiens

<400> 2796

Ala	Ser	Ala	Ala	Cys	Pro	Ser	Arg	Ser	Cys	Trp	Leu	Arg	Ser	Ser	Cys
1				5				10					15		
Pro	Lys	Val	Ala	Glu	Glu	Gly	Val	Ser	Ser	Met	Ser	Pro	Gly	Ala	Ser
			20					25					30		
Gly	Glu	Glu	Ala	Glu	Val	Leu	Glu	Pro	Arg	Gly	Ser	Ser	Ser	Gly	Cys
			35				40					45			
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	50					55									

<210> 2797

<211> 475

<212> DNA

<213> Homo sapiens

<400> 2797

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 120

ctgaactcca tcagcgagtc cccgcatgag cgcatgcacc cctacatcga gctggcctgg
 180
 ggcttctcca cegtgttgg catcctactc ttcttgccg aggtggtgct gctctgctgg
 240
 atcaagttcc tccccgtgga tgcccggcgc cagcctggcc cccacctgg ccctgggagt
 300
 cacacgggct ggcaggccgc cctggtgtcc accatcatca tggtgcccgt gggcctcatc
 360
 ttctgtgtct tcaccatcca cttctaccgc tccctggtgc gccacaaaac ggagcgccac
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<210> 2798

<211> 158

<212> PRT

<213> Homo sapiens

<400> 2798

Arg	Pro	Leu	Leu	Ile	Ala	Phe	Ser	Ala	Cys	Thr	Thr	Val	Leu	Val	Ala
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Val	His	Leu	Phe	Ala	Leu	Leu	Ile	Ser	Thr	Cys	Ile	Leu	Pro	Asn	Val
			20					25					30		
Glu	Ala	Val	Ser	Asn	Ile	His	Asn	Leu	Asn	Ser	Ile	Ser	Glu	Ser	Pro
		35					40					45			
His	Glu	Arg	Met	His	Pro	Tyr	Ile	Glu	Leu	Ala	Trp	Gly	Phe	Ser	Thr
	50					55					60				
Val	Leu	Gly	Ile	Leu	Leu	Phe	Leu	Ala	Glu	Val	Val	Leu	Leu	Cys	Trp
65				70					75					80	
Ile	Lys	Phe	Leu	Pro	Val	Asp	Ala	Arg	Arg	Gln	Pro	Gly	Pro	Pro	Pro
			85					90					95		
Gly	Pro	Gly	Ser	His	Thr	Gly	Trp	Gln	Ala	Ala	Leu	Val	Ser	Thr	Ile
			100					105					110		
Ile	Met	Val	Pro	Val	Gly	Leu	Ile	Phe	Val	Val	Phe	Thr	Ile	His	Phe
		115					120					125			
Tyr	Arg	Ser	Leu	Val	Arg	His	Lys	Thr	Glu	Arg	His	Asn	Arg	Glu	Ile
	130					135					140				
Glu	Glu	Leu	His	Lys	Leu	Lys	Val	Gln	Leu	Asp	Gly	His	Glu		
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<210> 2799

<211> 2872

<212> DNA

<213> Homo sapiens

<400> 2799

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 120
 gggcagccct tgagcttgac tcctctgggg ccagtctcta tcagaaaatg cctgaccagc
 180
 tcatgggtca tgtctccttt tttattctgc tgcattgatg ttggaggtgg cgaagacacc
 240

ttcatggcca gcccgtaaa gcctgagatc tccagggagc aggccatcgc gtcctcaag
300
gaccaggagc cgggggcctt catcatccgc gacagtcact ccttccgagg cgcgtacggg
360
ctggccatga aggtgtcttc gccacctcca accatcatgc agcagaataa aaaaggagac
420
atgacccatg agctggtcag gcattttctg atagagactg gcccagagg agtcaagctc
480
aagggtctgc ccaatgagcc aaacttcgga tcgctgtctg ccctggctta ccagcactcc
540
atcatcccat tggccctgcc ttgcaagctg gtcattccaa accgagacct cacagatgaa
600
tcgaaagata gtcgggccc tgccaactca actgcagacc tgctgaaaca aggggcagcc
660
tgcaatgtgc tcttcatcaa ctctgtggac atggagtcac tcactgggccc acaggccatc
720
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780
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900
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960
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1020
gccatcgtca acttcgtctc caaggatcatg ctgaatgccg gccaaaagag atgaaccttg
1080
ccccttgccc agggccagtg ccatggggaa ggggcttctg gggaggggac ccatgaatcc
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1320
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1380
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1440
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1560
ccgtgggaca tcaagtggaa gaacttggtt gcttgaaagt atctcagacc caaggcacct
1620
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1740
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1860

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 2220
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 2460
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 2520
 ggcagaaggc ttgcacttgg gccaaagggc ctaaggtcca ctggacagtt gggaaaacac
 2580
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 2700
 acatgagaca tactgacaga atctgtaagc taataaaatg taagaaaagg ttaaaaaaag
 2760
 aataggtaaa ttgacaagaa gtatttattg tttttccata ttgctttatt gccttccttg
 2820
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 2872

<210> 2800

<211> 294

<212> PRT

<213> Homo sapiens

<400> 2800

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Thr	Phe	Met	Ala	Ser	Pro	Tyr	Lys	Pro	Glu	Ile	Ser	Arg	Glu	Gln	Ala
			20					25					30		
Ile	Ala	Leu	Leu	Lys	Asp	Gln	Glu	Pro	Gly	Ala	Phe	Ile	Ile	Arg	Asp
		35				40					45				
Ser	His	Ser	Phe	Arg	Gly	Ala	Tyr	Gly	Leu	Ala	Met	Lys	Val	Ser	Ser
	50				55					60					
Pro	Pro	Pro	Thr	Ile	Met	Gln	Gln	Asn	Lys	Lys	Gly	Asp	Met	Thr	His
65				70						75				80	
Glu	Leu	Val	Arg	His	Phe	Leu	Ile	Glu	Thr	Gly	Pro	Arg	Gly	Val	Lys
			85					90					95		
Leu	Lys	Gly	Cys	Pro	Asn	Glu	Pro	Asn	Phe	Gly	Ser	Leu	Ser	Ala	Leu

100							105					110				
Val	Tyr	Gln	His	Ser	Ile	Ile	Pro	Leu	Ala	Leu	Pro	Cys	Lys	Leu	Val	
115							120					125				
Ile	Pro	Asn	Arg	Asp	Pro	Thr	Asp	Glu	Ser	Lys	Asp	Ser	Ser	Gly	Pro	
130							135					140				
Ala	Asn	Ser	Thr	Ala	Asp	Leu	Leu	Lys	Gln	Gly	Ala	Ala	Cys	Asn	Val	
145							150					155				
Leu	Phe	Ile	Asn	Ser	Val	Asp	Met	Glu	Ser	Leu	Thr	Gly	Pro	Gln	Ala	
165							170					175				
Ile	Ser	Lys	Ala	Thr	Ser	Glu	Thr	Leu	Ala	Ala	Asp	Pro	Thr	Pro	Ala	
180							185					190				
Ala	Thr	Ile	Val	His	Phe	Lys	Val	Ser	Ala	Gln	Gly	Ile	Thr	Leu	Thr	
195							200					205				
Asp	Asn	Gln	Arg	Lys	Leu	Phe	Phe	Arg	Arg	His	Tyr	Pro	Leu	Asn	Thr	
210							215					220				
Val	Thr	Phe	Cys	Asp	Leu	Asp	Pro	Gln	Glu	Arg	Lys	Trp	Met	Lys	Thr	
225							230					235				
Glu	Gly	Gly	Ala	Pro	Ala	Lys	Leu	Phe	Gly	Phe	Val	Ala	Arg	Lys	Gln	
245							250					255				
Gly	Ser	Thr	Thr	Asp	Asn	Ala	Cys	His	Leu	Phe	Ala	Glu	Leu	Asp	Pro	
260							265					270				
Asn	Gln	Pro	Ala	Ser	Ala	Ile	Val	Asn	Phe	Val	Ser	Lys	Val	Met	Leu	
275							280					285				
Asn	Ala	Gly	Gln	Lys	Arg											
290																

<210> 2801

<211> 549

<212> DNA

<213> Homo sapiens

<400> 2801

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120

ttcagcacac cagtggggca gtgcctcgaa aaggcaacag atggctccct gcaaagtga
180

gattggacgt tgaatatgga gatctgtgac atcatcaatg agacggagga agggccaaag
240

gatgccattc gagccctgaa gaagcggctc aacgggaacc ggaactacag agaggtgatg
300

ctggcattaa cagtgctgga gacatgtgtg aagaactgtg gccacogctt ccacatcctt
360

gtggccaacc gagatttcac cgacagtgtt ctggtcaaaa ttatatctcc caagaacaac
420

cctccaccca ttgtacagga caaagtgctt gctctgatcc aggcattgggc tgatgccttt
480

cgaagcagtc ctgatctcac cggcgttgtg cacatatatg aggagctgaa gaggaaaggg
540

gttgaattc

549

<210> 2802

<211> 151

<212> PRT

<213> Homo sapiens

<400> 2802

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Met Glu Phe Leu Leu Gly Asn Pro Phe Ser Thr Pro Val Gly Gln Cys
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Leu Glu Lys Ala Thr Asp Gly Ser Leu Gln Ser Glu Asp Trp Thr Leu
 20           25           30
Asn Met Glu Ile Cys Asp Ile Ile Asn Glu Thr Glu Glu Gly Pro Lys
 35           40           45
Asp Ala Ile Arg Ala Leu Lys Lys Arg Leu Asn Gly Asn Arg Asn Tyr
 50           55           60
Arg Glu Val Met Leu Ala Leu Thr Val Leu Glu Thr Cys Val Lys Asn
 65           70           75           80
Cys Gly His Arg Phe His Ile Leu Val Ala Asn Arg Asp Phe Ile Asp
 85           90           95
Ser Val Leu Val Lys Ile Ile Ser Pro Lys Asn Asn Pro Pro Thr Ile
 100          105          110
Val Gln Asp Lys Val Leu Ala Leu Ile Gln Ala Trp Ala Asp Ala Phe
 115          120          125
Arg Ser Ser Pro Asp Leu Thr Gly Val Val His Ile Tyr Glu Glu Leu
 130          135          140
Lys Arg Lys Gly Val Glu Phe
145          150

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<210> 2803

<211> 459

<212> DNA

<213> Homo sapiens

<400> 2803

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120
ccgccagccg tagggtgtgt gctgtccggg ctacagggga cctgtctcc gagtcgttcg
180
tgcagcgtgt gtaccagccc ttctcacca cctgcgacgg gcaccgggccc tgcagcacct
240
accgcaatat gccagccgcc atgccggaac ggagggagct gtgtccagcc tggccgctgc
300
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360
ggaagaagtg cagaggctgc agtccagggt ggacctgctg gaggagaagc tgcagctggt
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459

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<210> 2804

<211> 153

<212> PRT

<213> Homo sapiens

<400> 2804

Xaa Met Ala Thr Pro Gly Leu Gln Gln His Gln Gln Pro Pro Gly Pro
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 Gly Arg His Arg Trp Pro Pro Pro Pro Gly Gly Ala Ala Pro Ala Pro
 20 25 30
 Val Arg Gly Met Thr Asp Ser Pro Pro Pro Ala Val Gly Cys Val Leu
 35 40 45
 Ser Gly Leu Thr Gly Thr Leu Ser Pro Ser Arg Ser Cys Ser Val Cys
 50 55 60
 Thr Ser Pro Ser Ser Pro Pro Ala Thr Gly Thr Gly Pro Ala Ala Pro
 65 70 75 80
 Thr Ala Ile Cys Gln Pro Pro Cys Arg Asn Gly Gly Ser Cys Val Gln
 85 90 95
 Pro Gly Arg Cys Arg Cys Pro Ala Gly Trp Arg Gly Asp Thr Cys Gln
 100 105 110
 Ser Asp Val Asp Xaa Cys Asn Glu Gly Arg Ser Ala Glu Ala Ala Val
 115 120 125
 Gln Gly Gly Pro Ala Gly Gly Glu Ala Ala Ala Gly Thr Gly Pro Thr
 130 135 140
 Ala Gln Pro Gly Leu Ala Gly Thr Gly
 145 150

<210> 2805

<211> 771

<212> DNA

<213> Homo sapiens

<400> 2805

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 120
 gatctctgga atagctacca ggcaaagaaa aaaactatgg atgccaagaa tggccagaca
 180
 atgaatgaga agcaactctt ccatgggaca gatgccggct ccgtgccaca cgtcaatcga
 240
 aatggcttta accgcagcta tgccggaaaag aatgctgtgg catatggaaa gggaacctat
 300
 tttgctgtca atgccaatta ttctgccaat gatacgtact ccagaccaga tgcaaattggg
 360
 agaaagcatg tgtattatgt gcgagtactt actggaatct atacacatgg aaatcattca
 420
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 480
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 540
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 660
 tttctaatat ccaaggatca ttctttgtcg ctgcagtcag atctttcttc agcttctctt
 720
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 771

<210> 2806
 <211> 187
 <212> PRT
 <213> Homo sapiens

<400> 2806
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 20 25 30
 Lys Ile Glu Arg Ile Gln Asn Pro Asp Leu Trp Asn Ser Tyr Gln Ala
 35 40 45
 Lys Lys Lys Thr Met Asp Ala Lys Asn Gly Gln Thr Met Asn Glu Lys
 50 55 60
 Gln Leu Phe His Gly Thr Asp Ala Gly Ser Val Pro His Val Asn Arg
 65 70 75 80
 Asn Gly Phe Asn Arg Ser Tyr Ala Gly Lys Asn Ala Val Ala Tyr Gly
 85 90 95
 Lys Gly Thr Tyr Phe Ala Val Asn Ala Asn Tyr Ser Ala Asn Asp Thr
 100 105 110
 Tyr Ser Arg Pro Asp Ala Asn Gly Arg Lys His Val Tyr Tyr Val Arg
 115 120 125
 Val Leu Thr Gly Ile Tyr Thr His Gly Asn His Ser Leu Ile Val Pro
 130 135 140
 Pro Ser Lys Asn Pro Gln Asn Pro Thr Asp Leu Tyr Asp Thr Val Thr
 145 150 155 160
 Asp Asn Val His His Pro Ser Leu Phe Val Ala Phe Tyr Asp Tyr Gln
 165 170 175
 Ala Tyr Pro Glu Tyr Leu Ile Thr Phe Arg Lys
 180 185

<210> 2807
 <211> 1660
 <212> DNA
 <213> Homo sapiens

<400> 2807
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 120
 cccagggtgct cagggccgcc tgtgaatgca ggtgccttgt cccaaacaga ggacatatta
 180
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 480

agggagctct ccacactgga atcgctgtag ccgaggaggt tctaattgga cgatcttcga
 540
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 660
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 780
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 960
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 aacgctgatg gtggtctcag ggggaaaact caggacctgc acataagtgg atgaccggaa
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 1140
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 1560
 agcggggcca ggagctacga gtcggtacac ctgtcccggg tgcaagaact caaaccagcg
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<210> 2808

<211> 390

<212> PRT

<213> Homo sapiens

<400> 2808

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Glu	Leu	Ala	Gly	Cys	Ala	Ser	Cys	Leu	Thr	Val	Gln	Asp	Asn	Trp	Thr
			20					25				30			
Leu	Glu	Leu	Glu	Ser	Ser	Gln	Asp	Ile	Gln	Asp	Val	Leu	Asp	Ala	Asn
			35				40				45				
Lys	Ser	Leu	Pro	Glu	Ser	Ser	Leu	Thr	Asp	Leu	Leu	Ser	Asp	Asn	Phe

50		55		60
Thr Asp Ser Leu Val Ser Phe Ser Ala Glu Ile Leu Ser Arg Thr Leu				
65		70		75
Cys Glu Pro Leu Val Ala Ser Leu Trp Met Lys Leu Gly Asn Thr Gly				
	85		90	95
Ala Met Arg Arg Cys Val Lys Leu Thr Val Ala Leu Glu Thr Ala Glu				
	100		105	110
Cys Glu Phe Pro Pro His Leu Asp Val Tyr Ile Glu Asp Pro His Leu				
	115		120	125
Pro Pro Ser Leu Gly Leu Leu Pro Gly Ala Arg Val His Phe Ser Gln				
	130		135	140
Leu Glu Lys Arg Val Ser Arg Ser His Asn Val Tyr Cys Cys Phe Arg				
	145		150	155
Ser Ser Thr Tyr Val Gln Val Leu Ser Phe Pro Pro Glu Thr Thr Ile				
	165		170	175
Ser Val Pro Leu Pro His Ile Tyr Leu Ala Glu Leu Leu Gln Gly Gly				
	180		185	190
Gln Ser Pro Phe Gln Ala Thr Ala Ser Cys His Ile Val Ser Val Phe				
	195		200	205
Ser Leu Gln Leu Phe Trp Val Cys Ala Tyr Cys Thr Ser Ile Cys Arg				
	210		215	220
Gln Gly Lys Cys Thr Arg Leu Gly Ser Thr Cys Pro Thr Gln Thr Ala				
	225		230	235
Ile Ser Gln Ala Ile Ile Arg Leu Leu Val Glu Asp Gly Thr Ala Glu				
	245		250	255
Ala Val Val Thr Cys Arg Asn His His Val Ala Ala Ala Leu Gly Leu				
	260		265	270
Cys Pro Arg Glu Trp Ala Ser Leu Leu Asp Phe Val Gln Val Pro Gly				
	275		280	285
Arg Val Val Leu Gln Phe Ala Gly Pro Gly Ala Gln Leu Glu Ser Ser				
	290		295	300
Ala Arg Val Asp Glu Pro Met Thr Met Phe Leu Trp Thr Leu Cys Thr				
	305		310	315
Ser Pro Ser Val Leu Arg Pro Ile Val Leu Ser Phe Glu Leu Glu Arg				
	325		330	335
Lys Pro Ser Lys Ile Val Pro Leu Glu Pro Pro Arg Leu Gln Arg Phe				
	340		345	350
Gln Cys Gly Glu Leu Pro Phe Leu Thr His Val Asn Pro Arg Leu Arg				
	355		360	365
Leu Ser Cys Leu Ser Ile Arg Glu Ser Glu Tyr Ser Ser Ser Leu Gly				
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Ile Leu Ala Ser Ser Cys				
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<210> 2809

<211> 1502

<212> DNA

<213> Homo sapiens

<400> 2809

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<210> 2810

<211> 102

<212> PRT

<213> Homo sapiens

<400> 2810

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 Ala Cys Val Cys Ala Cys Val Arg Leu Cys Val Arg Leu Cys Ala Cys
 35 40 45
 Val Cys Ala Ser Val Cys Met Cys Ala Arg Ala Xaa Val Cys Val Cys
 50 55 60
 Thr Cys Val Xaa Leu Cys Thr Arg Val Cys Val Cys Val His Ala Cys
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<210> 2811

<211> 591

<212> DNA

<213> Homo sapiens

<400> 2811

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<210> 2812

<211> 131

<212> PRT

<213> Homo sapiens

<400> 2812

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 20 25 30
 Pro Ala Pro Ala Val Asp Glu Pro Gln Pro Xaa Ser Gln Ala Pro Pro

35	40	45
Gly Pro Arg Val Pro Gly Pro Pro Arg Pro Trp Gly Ala Ala Pro Leu		
50	55	60
Arg Pro Arg Pro Gly Glu Gly Asp Pro Val Thr Arg Glu Arg Ser Pro		
65	70	75
Val Pro Gly Ala Thr Glu Met Pro Pro Pro Arg Pro Lys Val Pro Ala		
85	90	95
Pro Pro Gly Pro Thr Gly Arg Ser Pro Arg Ala Ala Val Gly His His		
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Leu Gly Ser		
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<210> 2813

<211> 2417

<212> DNA

<213> Homo sapiens

<400> 2813

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<210> 2814

<211> 471

<212> PRT

<213> Homo sapiens

<400> 2814

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      20           25           30
Trp Lys Glu Leu Ser Leu Lys Tyr Lys Gln Ser Phe Gln Glu Ala Arg
      35           40           45
Asp Glu Leu Val Glu Phe Gln Glu Gly Ser Arg Glu Leu Glu Ala Glu
 50           55           60
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65           70           75           80
Ala Asp Asn Gln Arg Leu Lys Tyr Glu Val Glu Ala Leu Lys Glu Lys
      85           90           95
Leu Glu His Gln Tyr Ala Gln Ser Tyr Lys Gln Val Ser Val Leu Glu
      100           105           110
Asp Asp Leu Ser Gln Thr Arg Ala Ile Lys Glu Gln Leu His Lys Tyr
      115           120           125
Val Arg Glu Leu Glu Gln Ala Asn Asp Asp Leu Glu Arg Ala Lys Arg
      130           135           140
Ala Thr Ile Val Ser Leu Glu Thr Leu Asn Lys Leu Asn Gln Ala Ile
145           150           155           160
Glu Arg Asn Ala Phe Leu Glu Ser Glu Leu Asp Glu Lys Glu Ser Leu
      165           170           175
Leu Val Ser Val Gln Arg Leu Lys Asp Glu Ala Arg Asp Leu Arg Gln
      180           185           190
Glu Leu Ala Val Arg Glu Arg Gln Gln Glu Val Thr Arg Lys Ser Ala
      195           200           205
Pro Ser Ser Pro Thr Leu Asp Cys Glu Lys Met Asp Ser Ala Val Gln
210           215           220
Ala Ser Leu Ser Leu Pro Ala Thr Pro Val Gly Lys Gly Thr Glu Asn
225           230           235           240
Thr Phe Pro Ser Pro Lys Ala Ile Pro Asn Gly Phe Gly Thr Ser Pro
      245           250           255
Leu Thr Pro Ser Ala Arg Ile Ser Ala Leu Asn Ile Val Gly Asp Leu
      260           265           270
Leu Arg Lys Val Gly Ala Leu Glu Ser Lys Leu Ala Ala Cys Arg Asn
      275           280           285
Phe Ala Lys Asp Gln Ala Ser Arg Lys Ser Tyr Ile Ser Gly Asn Val
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His Thr Ser Phe Phe Asp Lys Gly Ala Val Asn Gly Phe Asp Pro Ala
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Pro Pro Pro Pro Gly Leu Gly Ser Ser Arg Pro Ser Ser Ala Pro Gly
      340           345           350
Met Cys Leu Ser Val Cys Glu Cys Leu Ala Ser Arg Gly Ala Pro Ala
      355           360           365
Leu Leu Gln Gln Pro Arg Thr Pro Thr Pro His Pro Ser Val Pro Gly
      370           375           380
Pro Ser Pro Val Pro Leu Arg Leu Pro Pro His Gly Trp Gln Arg Ala
385           390           395           400
Gly Cys Met Gln Trp Arg Leu Leu Gly Pro Ala Gln Pro Arg Asn Ser
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<210> 2815

<211> 1421

<212> DNA

<213> Homo sapiens

<400> 2815

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<210> 2816

<211> 307

<212> PRT

<213> Homo sapiens

<400> 2816

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Val	Arg	Ala	His	Gly	Asp	Pro	Val	Ser	Glu	Ser	Phe	Val	Gln	Arg	Val
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Tyr	Gln	Pro	Phe	Leu	Thr	Thr	Cys	Asp	Gly	His	Arg	Ala	Cys	Ser	Thr
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Tyr	Arg	Thr	Ile	Tyr	Arg	Thr	Ala	Tyr	Arg	Arg	Ser	Pro	Gly	Leu	Ala
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Pro	Ala	Arg	Pro	Arg	Tyr	Ala	Cys	Cys	Pro	Gly	Trp	Lys	Arg	Thr	Ser
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Gly	Leu	Pro	Gly	Ala	Cys	Gly	Ala	Ala	Ile	Cys	Gln	Pro	Pro	Cys	Arg
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Asn	Gly	Gly	Ser	Cys	Val	Gln	Pro	Gly	Arg	Cys	Arg	Cys	Pro	Ala	Gly
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Trp	Arg	Gly	Asp	Thr	Cys	Gln	Ser	Asp	Val	Asp	Glu	Cys	Ser	Ala	Arg
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Arg	Gly	Gly	Cys	Pro	Gln	Arg	Cys	Val	Asn	Thr	Ala	Gly	Ser	Tyr	Trp
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			165					170						175	
Val	Pro	Lys	Gly	Gly	Pro	Pro	Arg	Val	Ala	Pro	Asn	Pro	Thr	Gly	Val
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Asp	Ser	Ala	Met	Lys	Glu	Glu	Val	Gln	Arg	Leu	Gln	Ser	Arg	Val	Asp
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Ala	Leu	Leu	Pro	Ala	Ala	Arg	Pro	His	Arg	Leu	Pro	Glu	Arg	Ala	Asp
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Xaa	Asp	Cys	Pro	Ala	Pro	Gln	Ala	Gly	Leu	Ser	Pro	Ser	Arg	Arg	Pro
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<210> 2817

<211> 219

<212> DNA

<213> Homo sapiens

<400> 2817

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<211> 73

<212> PRT

<213> Homo sapiens

<400> 2818

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			20					25					30		
Pro	Gly	Ala	Ser	Leu	Gly	Pro	Gly	Val	Leu	Leu	Arg	Ala	Glu	Phe	His
		35					40					45			
Gln	His	Gln	His	Thr	His	Gln	His	Thr	His	Gln	His	Thr	His	Gln	His
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Gln	His	Thr	Phe	Ala	Pro	Phe	Thr	Arg							
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<210> 2819

<211> 730

<212> DNA

<213> Homo sapiens

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<210> 2820
 <211> 195
 <212> PRT
 <213> Homo sapiens

<400> 2820
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 Val Gly Arg Glu Ala His Ala Gln Gln Pro Leu Leu Pro Asp Val Ile
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 85 90 95
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 Val His Thr Trp Asn Gln Lys Glu Thr Tyr Leu His Ile Met Lys Asn
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 130 135 140
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 145 150 155 160
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<210> 2821
 <211> 1746
 <212> DNA
 <213> Homo sapiens

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Gly	Ser	Arg	Glu	Gly	Ser	Asp	Val	Ala	Cys	Thr	Glu	Gly	Ile	Cys Asn
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His	Asp	Glu	His	Gly	Asp	Asp	Ser	Cys	Val	His	His	Cys	Glu	Asp Lys
465				470						475				480
Glu	Asp	Asp	Gly	Asp	Ser	Cys	Val	Glu	Cys	Trp	Ala	Asn	Ser	Glu Glu
			485					490						495
Asn	Asp	Thr	Lys	Gly	Lys	Asn	Lys	Lys	Lys	Lys	Lys	Lys	Ser	Lys Ile

		500						505						510								
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		515						520						525								
Pro	Gly	Asn	Arg	Glu	Thr	Ser	Gly	Asn	Thr	Met	His	Thr	Val	Phe	His							
		530						535						540								
Arg	Asp	Lys	Thr	Lys	Asp	Thr	His	Pro	Glu	Ser	Cys	Cys	Ser	Ser	Glu							
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Lys	Gly	Gly	Gln	Pro	Leu	Pro	Trp	Phe	Glu	His	Arg	Lys	Asn	Val	Pro							
				565						570						575						
Gln	Phe	Ala	Glu	Pro	Thr	Glu	Thr	Leu	Phe	Gly	Pro	Asp	Ser	Gly	Lys							
			580						585						590							
Gly	Ala	Lys	Ser	Leu	Val	Glu	Leu	Leu	Asp	Glu	Ser	Glu	Cys	Thr	Ser							
		595						600						605								
Asp	Glu	Glu	Ile	Phe	Ile	Ser	Gln	Asp	Glu	Ile	Gln	Ser	Phe	Met	Ala							
	610						615						620									
Asn	Asn	Gln	Ser	Phe	Tyr	Ser	Asn	Arg	Glu	Gln	Tyr	Arg	Gln	His	Leu							
625					630						635						640					
Lys	Glu	Lys	Phe	Asn	Lys	Tyr	Cys	Arg	Leu	Asn	Asp	His	Lys	Arg	Pro							
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<210> 2831
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<212> DNA
<213> Homo sapiens
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780

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<210> 2832
 <211> 611
 <212> PRT
 <213> Homo sapiens

<400> 2832

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          20           25           30
Gly Thr Arg Thr Ser Ser Gly Arg Leu Arg Arg Leu Gly Asp Ser Ser
          35           40           45
Gly Pro Ala Leu Lys Arg Ser Phe Glu Val Glu Glu Val Glu Thr Pro
          50           55           60
Asn Ser Thr Pro Pro Arg Arg Val Gln Thr Pro Leu Leu Arg Ala Thr
65           70           75           80
Val Ala Ser Ser Thr Gln Lys Phe Gln Asp Leu Gly Val Lys Asn Ser
          85           90           95
Glu Pro Ser Ala Arg His Val Asp Ser Leu Ser Gln Arg Ser Pro Lys
          100          105          110
Ala Ser Leu Arg Arg Val Glu Leu Ser Gly Pro Lys Ala Ala Glu Pro
          115          120          125
Val Ser Arg Arg Thr Glu Leu Ser Ile Asp Ile Ser Ser Lys Gln Val
          130          135          140
Glu Asn Ala Gly Ala Ile Gly Pro Ser Arg Phe Gly Leu Lys Arg Ala
145          150          155          160
Glu Val Leu Gly His Lys Thr Pro Glu Pro Ala Pro Arg Arg Thr Glu
          165          170          175
Ile Thr Ile Val Lys Pro Gln Glu Ser Ala His Arg Arg Met Glu Pro
          180          185          190
Pro Ala Ser Lys Val Pro Glu Val Pro Thr Ala Pro Ala Thr Asp Ala
          195          200          205
Ala Pro Lys Arg Val Glu Ile Gln Met Pro Lys Pro Ala Glu Ala Pro
          210          215          220
Thr Ala Pro Ser Pro Ala Gln Thr Leu Glu Asn Ser Glu Pro Ala Pro
225          230          235          240
Val Ser Gln Leu Gln Ser Arg Leu Glu Pro Lys Pro Gln Pro Pro Val
          245          250          255
Ala Glu Ala Thr Pro Arg Ser Gln Glu Ala Thr Glu Ala Ala Pro Ser
          260          265          270
Cys Val Gly Asp Met Ala Asp Thr Pro Arg Asp Ala Gly Leu Lys Gln
          275          280          285
Ala Pro Ala Ser Arg Asn Glu Lys Ala Pro Val Asp Phe Gly Tyr Val
          290          295          300
Gly Ile Asp Ser Ile Leu Glu Gln Met Arg Arg Lys Ala Met Lys Gln
305          310          315          320
Gly Phe Glu Phe Asn Ile Met Val Val Gly Gln Ser Gly Leu Gly Lys
          325          330          335
Ser Thr Leu Ile Asn Thr Leu Phe Lys Ser Lys Ile Ser Arg Lys Ser
          340          345          350
Val Gln Pro Thr Ser Glu Glu Arg Ile Pro Lys Thr Ile Glu Ile Lys
          355          360          365
Ser Ile Thr His Asp Ile Glu Glu Lys Gly Val Arg Met Lys Leu Thr

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370	375	380
Val Ile Asp Thr Pro Gly Phe Gly Asp His Ile Asn Asn Glu Asn Cys		
385	390	395
Trp Gln Pro Ile Met Lys Phe Ile Asn Asp Gln Tyr Glu Lys Tyr Leu		400
	405	410
Gln Glu Glu Val Asn Ile Asn Arg Lys Lys Arg Ile Pro Asp Thr Arg		415
	420	425
Val His Cys Cys Leu Tyr Phe Ile Pro Ala Thr Gly His Ser Leu Arg		430
	435	440
Pro Leu Asp Ile Glu Phe Met Lys Arg Leu Ser Lys Val Val Asn Ile		445
	450	455
Val Pro Val Ile Ala Lys Ala Asp Thr Leu Thr Leu Glu Glu Arg Val		460
465	470	475
His Phe Lys Gln Arg Ile Thr Ala Asp Leu Leu Ser Asn Gly Ile Asp		480
	485	490
Val Tyr Pro Gln Lys Glu Phe Asp Glu Asp Ser Glu Asp Arg Leu Val		495
	500	505
Asn Glu Lys Phe Arg Glu Met Ile Pro Phe Ala Val Val Gly Ser Asp		510
	515	520
His Glu Tyr Gln Val Asn Gly Lys Arg Ile Leu Gly Arg Lys Thr Lys		525
	530	535
Trp Gly Thr Ile Glu Val Glu Asn Thr Thr His Cys Glu Phe Ala Tyr		540
545	550	555
Leu Arg Asp Leu Leu Ile Arg Thr His Met Gln Asn Ile Lys Asp Ile		560
	565	570
Thr Ser Ser Ile His Phe Glu Ala Tyr Arg Val Lys Arg Leu Asn Glu		575
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Pro Glu Met		605
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<210> 2833

<211> 420

<212> DNA

<213> Homo sapiens

<400> 2833

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240
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300
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<210> 2834

<211> 117

<212> PRT

<213> Homo sapiens

<400> 2834

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Leu Leu Arg Leu Leu Arg Ser Pro Thr Leu Arg Gly His Gly Gly Ala
 20             25             30
Ser Gly Arg Asn Val Thr Thr Gly Ser Leu Gly Glu Pro Gln Trp Leu
 35             40             45
Arg Val Ala Thr Gly Gly Arg Pro Gly Thr Ser Pro Ala Leu Phe Ser
 50             55             60
Gly Arg Gly Ala Ala Thr Gly Gly Arg Gln Gly Gly Arg Phe Asp Thr
 65             70             75             80
Lys Cys Leu Ala Ala Ala Thr Trp Gly Arg Leu Pro Gly Pro Glu Glu
 85             90             95
Thr Leu Pro Gly Gln Asp Ser Trp Asn Gly Val Pro Ser Arg Ala Gly
 100            105            110
Leu Gly Met Cys Ala
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<210> 2835

<211> 938

<212> DNA

<213> Homo sapiens

<400> 2835

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120
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180
tatgtagaat acacttcaga attgtcctgc tcaaggacaa tgaagctgag gtctgtctcc
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300
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660
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780

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 938

<210> 2836
 <211> 178
 <212> PRT
 <213> Homo sapiens

<400> 2836
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 35 40 45
 Thr Leu Ser Val Arg Gly Glu Asp Ile Gly Glu Asp Leu Phe Ser Glu
 50 55 60
 Ala Leu Gly Arg Ala Val Gly Gln Trp Ala Gly Ala Lys Leu Leu Asp
 65 70 75 80
 His Gly Cys Val Glu Ser Ser Ile Leu Asp Ser Ser Ala Gly Ser Ala
 85 90 95
 Pro His Tyr Glu Val Phe Val Ala Leu Arg Gly Leu Arg Asn Leu Ser
 100 105 110
 Glu Glu Asn Arg Asp Lys Leu Asp His Cys Leu Gln Glu Ala Ser Pro
 115 120 125
 Arg Tyr Lys Ser Leu Arg Phe Trp Gly Ser Val Gly Pro Ala Glu Ser
 130 135 140
 Thr Trp Trp Cys Pro Glu Ser Ser Pro Ala Pro Pro Pro Ser Ser Pro
 145 150 155 160
 Gln Arg Pro Pro Arg Pro Ser Leu Trp Asp Leu Ser Gly Trp Gly Val
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 Leu Gly

<210> 2837
 <211> 1250
 <212> DNA
 <213> Homo sapiens

<400> 2837
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 780
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 840
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<210> 2838

<211> 370

<212> PRT

<213> Homo sapiens

<400> 2838

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Ile	Ser	Ser	Pro	Val	Phe	Thr	Met	Glu	Asp	Ser	Gly	Lys	Thr	Phe	Ser
			20					25					30		
Ser	Glu	Glu	Glu	Glu	Ala	Asn	Tyr	Trp	Lys	Asp	Leu	Ala	Met	Thr	Tyr
		35				40					45				
Lys	Gln	Arg	Ala	Glu	Asn	Thr	Gln	Glu	Glu	Leu	Arg	Glu	Phe	Gln	Glu
	50				55					60					
Gly	Ser	Arg	Glu	Tyr	Glu	Ala	Glu	Leu	Glu	Thr	Gln	Leu	Gln	Gln	Ile
65			70					75						80	
Glu	Thr	Arg	Asn	Arg	Asp	Leu	Leu	Ser	Glu	Asn	Asn	Arg	Leu	Arg	Met
			85					90					95		
Glu	Leu	Glu	Thr	Ile	Lys	Glu	Lys	Phe	Glu	Val	Gln	His	Ser	Glu	Gly
		100				105							110		
Tyr	Arg	Gln	Ile	Ser	Ala	Leu	Glu	Asp	Asp	Leu	Ala	Gln	Thr	Lys	Ala

115	120	125
Ile Lys Asp Gln Leu Gln Lys Tyr Ile Arg Glu Leu Glu Gln Ala Asn		
130	135	140
Asp Ala Leu Glu Arg Ala Lys Arg Ala Thr Ile Met Ser Leu Glu Asp		
145	150	155
Phe Glu Gln Arg Leu Asn Gln Ala Ile Glu Arg Asn Ala Phe Leu Glu		
165	170	175
Ser Glu Leu Asp Glu Lys Glu Asn Leu Leu Glu Ser Val Gln Arg Leu		
180	185	190
Lys Asp Glu Ala Arg Asp Leu Arg Gln Glu Leu Ala Val Gln Gln Lys		
195	200	205
Gln Glu Lys Pro Arg Thr Pro Met Pro Ser Ser Val Glu Ala Glu Arg		
210	215	220
Thr Asp Thr Ala Val Gln Ala Thr Gly Ser Val Pro Ser Thr Pro Ile		
225	230	235
Ala His Arg Gly Pro Ser Ser Ser Leu Asn Thr Pro Gly Ser Phe Arg		
245	250	255
Arg Gly Leu Asp Asp Xaa His Arg Gly Thr Pro Leu Thr Pro Ala Ala		
260	265	270
Arg Ile Ser Ala Leu Asn Ile Val Gly Asp Leu Leu Arg Lys Val Gly		
275	280	285
Ala Leu Glu Ser Lys Leu Ala Ser Cys Arg Asn Leu Val Tyr Asp Gln		
290	295	300
Ser Pro Asn Arg Thr Gly Gly Pro Ala Ser Gly Arg Ser Ser Lys Asn		
305	310	315
Arg Asp Gly Gly Glu Arg Arg Pro Ser Ser Thr Ser Val Pro Leu Gly		
325	330	335
Asp Lys Gly Ser Val Pro Ser Asn Lys Pro Leu Ala Gly Gly Glu Asn		
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Pro Pro Ala Pro Gly Lys Arg His Ser Pro Pro Ala His Ser His Val		
355	360	365
Ser Phe		
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<210> 2839

<211> 606

<212> DNA

<213> Homo sapiens

<400> 2839

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120
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180
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240
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300
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360
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420

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 606

<210> 2840

<211> 202

<212> PRT

<213> Homo sapiens

<400> 2840

Ile	Leu	Asn	Leu	Cys	Lys	Ile	His	Lys	Met	His	Ser	Phe	Leu	Asp	Tyr
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Ile	Met	Gly	Gly	Cys	Gln	Ile	Gln	Phe	Thr	Val	Ala	Ile	Asp	Phe	Ala
		20						25					30		
Ala	Thr	Asn	Gly	Asp	Pro	Arg	Asn	Ser	Cys	Ser	Leu	His	Tyr	Ile	His
		35					40					45			
Pro	Tyr	Gln	Pro	Asn	Glu	Tyr	Leu	Lys	Ala	Leu	Val	Ala	Val	Gly	Glu
	50					55					60				
Ile	Cys	Gln	Asp	Tyr	Asp	Ser	Asp	Lys	Met	Phe	Pro	Ala	Phe	Gly	Phe
65					70					75					80
Gly	Ala	Arg	Ile	Pro	Pro	Glu	Tyr	Thr	Val	Ser	His	Asp	Phe	Ala	Ile
				85					90						95
Asn	Phe	Asn	Glu	Asp	Asn	Pro	Glu	Cys	Ala	Gly	Ile	Gln	Gly	Val	Val
			100					105						110	
Glu	Ala	Tyr	Gln	Ser	Cys	Leu	Pro	Lys	Leu	Gln	Leu	Tyr	Gly	Pro	Thr
	115						120					125			
Asn	Ile	Ala	Pro	Ile	Ile	Gln	Lys	Val	Ala	Lys	Ser	Ala	Ser	Glu	Glu
	130					135					140				
Thr	Asn	Thr	Lys	Glu	Ala	Ser	Gln	Tyr	Phe	Ile	Leu	Leu	Ile	Leu	Thr
145				150					155					160	
Asp	Gly	Val	Ile	Thr	Asp	Met	Gly	Asp	Thr	Arg	Glu	Ala	Ile	Val	His
				165				170						175	
Ala	Ser	His	Leu	Pro	Met	Ser	Val	Ile	Ile	Val	Gly	Val	Gly	Asn	Ala
			180					185						190	
Asp	Phe	Ser	Asp	Met	Gln	Met	Leu	Asp	Gly						
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<210> 2841

<211> 2065

<212> DNA

<213> Homo sapiens

<400> 2841

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 120
 gaagggccag ttcaggtggc cggagctcct gagctgccct aggggactgc tgtgggtctg
 180

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 240
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 300
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 420
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 660
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 720
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 780
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 840
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 900
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 1020
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 1440
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 1740
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 1800

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 1920
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 2040
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<210> 2842

<211> 540

<212> PRT

<213> Homo sapiens

<400> 2842

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Pro	Pro	Val	Gly	Thr	Gly	Arg	Ser	Pro	Arg	Lys	Arg	Thr	Thr	Ser	Gln	35	40	45	
Cys	Lys	Ser	Glu	Pro	Pro	Leu	Leu	Arg	Thr	Ser	Lys	Arg	Thr	Ile	Tyr	50	55	60	
Thr	Ala	Gly	Arg	Pro	Pro	Trp	Tyr	Asn	Glu	His	Gly	Thr	Gln	Ser	Lys	65	70	75	80
Glu	Ala	Phe	Ala	Ile	Gly	Leu	Gly	Gly	Gly	Ser	Ala	Ser	Gly	Lys	Thr	85	90	95	
Thr	Val	Ala	Arg	Met	Ile	Ile	Glu	Ala	Leu	Asp	Val	Pro	Trp	Val	Val	100	105	110	
Leu	Leu	Ser	Met	Asp	Ser	Phe	Tyr	Lys	Val	Leu	His	Ser	Leu	Pro	His	115	120	125	
Gln	Val	Leu	Thr	Glu	Gln	Gln	Gln	Glu	Gln	Ala	Ala	His	Asn	Asn	Phe	130	135	140	
Asn	Phe	Asp	His	Pro	Asp	Ala	Phe	Asp	Phe	Asp	Leu	Ile	Ile	Ser	Thr	145	150	155	160
Leu	Lys	Lys	Leu	Lys	Gln	Gly	Lys	Ser	Val	Lys	Val	Pro	Ile	Tyr	Asp	165	170	175	
Phe	Thr	Thr	His	Ser	Arg	Lys	Lys	Asp	Trp	Lys	Thr	Leu	Tyr	Gly	Ala	180	185	190	
Asn	Val	Ile	Ile	Phe	Glu	Gly	Ile	Met	Ala	Phe	Ala	Asp	Lys	Thr	Leu	195	200	205	
Leu	Glu	Leu	Leu	Asp	Met	Lys	Ile	Phe	Val	Asp	Thr	Asp	Ser	Asp	Ile	210	215	220	
Arg	Leu	Val	Arg	Arg	Leu	Arg	Arg	Asp	Ile	Ser	Glu	Arg	Gly	Arg	Asp	225	230	235	240
Ile	Glu	Gly	Val	Ile	Lys	Gln	Tyr	Asn	Lys	Phe	Val	Lys	Pro	Ser	Phe	245	250	255	
Asp	Gln	Tyr	Ile	Gln	Pro	Thr	Met	Arg	Leu	Ala	Asp	Ile	Val	Val	Pro	260	265	270	
Arg	Gly	Ser	Gly	Asn	Thr	Val	Ala	Ile	Asp	Leu	Ile	Val	Gln	His	Val	275	280	285	
His	Ser	Gln	Leu	Glu	Glu	Arg	Glu	Leu	Ser	Val	Arg	Ala	Ala	Leu	Ala				

290	295	300
Ser Ala His Gln Cys His Pro Leu Pro Arg Thr Leu Ser Val Leu Lys		
305	310	315
Ser Thr Pro Gln Val Arg Gly Met His Thr Ile Ile Arg Asp Lys Glu		
	325	330
Thr Ser Arg Asp Glu Phe Ile Phe Tyr Ser Lys Arg Leu Met Arg Leu		
	340	345
Leu Ile Glu His Ala Leu Ser Phe Leu Pro Phe Gln Asp Cys Val Val		
	355	360
Gln Thr Pro Gln Gly Gln Asp Tyr Ala Gly Lys Cys Tyr Ala Gly Lys		
	370	375
Gln Ile Thr Gly Val Ser Ile Leu Arg Ala Gly Glu Thr Met Glu Pro		
385	390	395
Ala Leu Arg Ala Val Cys Lys Asp Val Arg Ile Gly Thr Ile Leu Ile		
	405	410
Gln Thr Asn Gln Leu Thr Gly Glu Pro Glu Leu His Tyr Leu Arg Leu		
	420	425
Pro Lys Asp Ile Ser Asp Asp His Val Ile Leu Met Asp Cys Thr Val		
	435	440
Ser Thr Gly Ala Ala Ala Met Met Ala Val Arg Val Leu Leu Asp His		
	450	455
Asp Val Pro Glu Asp Lys Ile Phe Leu Leu Ser Leu Leu Met Ala Glu		
465	470	475
Met Gly Val His Ser Val Ala Tyr Ala Phe Pro Arg Val Arg Ile Ile		
	485	490
Thr Thr Ala Val Asp Lys Arg Val Asn Asp Leu Phe Arg Ile Ile Pro		
	500	505
Gly Ile Gly Asn Phe Gly Asp Arg Tyr Phe Gly Thr Asp Ala Val Pro		
	515	520
Asp Gly Ser Asp Glu Glu Glu Val Ala Tyr Thr Gly		
530	535	540

<210> 2843

<211> 497

<212> DNA

<213> Homo sapiens

<400> 2843

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caaagcccag aatttgaagc tcaaagttcc aaattccagg aaggtgcgga gatgcttctg
180
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300
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480

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497

<210> 2844
<211> 165
<212> PRT
<213> Homo sapiens

<400> 2844
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Tyr Glu Pro Arg Ser Pro Gly Tyr Glu Ser Glu Ser Ser Arg Tyr Glu
20 25 30
Ser Gln Asn Thr Glu Leu Lys Thr Gln Ser Pro Glu Phe Glu Ala Gln
35 40 45
Ser Ser Lys Phe Gln Glu Gly Ala Glu Met Leu Leu Asn Pro Glu Glu
50 55 60
Lys Ser Pro Leu Asn Ile Ser Val Gly Val His Pro Leu Asp Ser Phe
65 70 75 80
Thr Gln Gly Phe Gly Glu Gln Pro Thr Gly Asp Leu Pro Ile Gly Pro
85 90 95
Pro Phe Glu Met Pro Thr Gly Ala Leu Leu Ser Thr Pro Gln Phe Glu
100 105 110
Met Leu Gln Asn Pro Leu Gly Leu Thr Gly Ala Leu Arg Gly Pro Gly
115 120 125
Arg Arg Gly Gly Arg Ala Arg Gly Gly Gln Gly Pro Arg Pro Asn Ile
130 135 140
Cys Gly Ile Trp Gly Lys Ser Phe Gly Arg Asp Tyr Pro Asp Pro Ala
145 150 155 160
Gln Ala Ser Thr Pro
165

<210> 2845
<211> 934
<212> DNA
<213> Homo sapiens

<400> 2845
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120
ttcaccaagg ctcggggttc tatagcccct ttctgggaca gctgcatggg atccggcctc
180
tcaggcccca cgggtgggtgc gggggctgtg gaaaggtctc agctgcaggg ggatgaatgt
240
gacctccagt tgcaacgtct ccccccgcgt gagtgggggtt atcaggccta gctcaccttg
300
tgtgcagtca gtgtcgagtg ccacctgcgt actggatgct gctctcagtg ctgcggtgcc
360
acagcacaca aaaatagttc tcacgttgcc gtggagagac aagcagtcaa cgcagatata
420
tcctgtggca agtgatggta aatgctgtgg caagaaagca ggttctggag gtgaagggcg
480

gtgggggaga cagggcaggg aaggtgagca gcggtctgag agtcccttgt ggcacctcgt
 540
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 720
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 780
 ttccctattc ttttctattg agttaaaagg cctgggtggca ttgtcgggtg gggcacattg
 840
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<210> 2846

<211> 149

<212> PRT

<213> Homo sapiens

<400> 2846

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Leu	Pro	Cys	Pro	Leu	Gly	Ser	Gly	Arg	Leu	Trp	Leu	Met	Pro	Thr	Arg
			20					25					30		
Cys	His	Lys	Gly	Leu	Ser	Asp	Arg	Cys	Ser	Pro	Ser	Leu	Pro	Cys	Leu
		35					40					45			
Pro	His	Arg	Pro	Ser	Pro	Pro	Glu	Pro	Ala	Phe	Leu	Pro	Gln	His	Leu
		50				55					60				
Pro	Ser	Leu	Ala	Thr	Gly	Tyr	Ile	Cys	Val	Asp	Cys	Leu	Ser	Leu	His
65					70					75				80	
Gly	Asn	Val	Arg	Thr	Ile	Phe	Val	Cys	Cys	Gly	Thr	Ala	Ala	Leu	Arg
				85				90						95	
Ala	Ala	Ser	Ser	Thr	Gln	Val	Ala	Leu	Asp	Thr	Asp	Cys	Thr	Gln	Gly
			100					105					110		
Glu	Leu	Gly	Leu	Ile	Thr	Pro	Leu	Thr	Arg	Gly	Glu	Thr	Leu	Gln	Leu
		115					120					125			
Glu	Val	Thr	Phe	Ile	Pro	Leu	Gln	Leu	Arg	Pro	Phe	His	Ser	Pro	Arg
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Thr	His	Arg	Gly	Ala											
145															

<210> 2847

<211> 2830

<212> DNA

<213> Homo sapiens

<400> 2847

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 120

cagctctcac atgaccacga atctgttggc cctcctagcc tggatgctca gccaactca
180
aagacagaaa gatcaaaatc atatgatgag ggtctggatg attacagaga agatgcaaaa
240
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300
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420
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480
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 2640
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 2700
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 2760
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 2830

<210> 2848

<211> 856

<212> PRT

<213> Homo sapiens

<400> 2848

Xaa	Asp	His	Asp	Ile	Ala	His	Ile	Pro	Ala	Ser	Ala	Val	Ile	Ser	Ala
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Ser	Thr	Ser	Gln	Val	Pro	Ser	Ile	Ala	Thr	Val	Pro	Pro	Cys	Leu	Thr
		20						25					30		
Thr	Ser	Ala	Pro	Leu	Ile	Arg	Arg	Gln	Leu	Ser	His	Asp	His	Glu	Ser
		35					40					45			
Val	Gly	Pro	Pro	Ser	Leu	Asp	Ala	Gln	Pro	Asn	Ser	Lys	Thr	Glu	Arg
	50					55					60				
Ser	Lys	Ser	Tyr	Asp	Glu	Gly	Leu	Asp	Asp	Tyr	Arg	Glu	Asp	Ala	Lys

65					70					75				80	
Leu	Ser	Phe	Lys	His	Val	Ser	Ser	Leu	Lys	Gly	Ile	Lys	Ile	Ala	Asp
				85					90					95	
Ser	Gln	Lys	Ser	Ser	Glu	Asp	Ser	Gly	Ser	Arg	Lys	Asp	Ser	Ser	Ser
			100					105					110		
Glu	Val	Phe	Ser	Asp	Ala	Ala	Lys	Glu	Gly	Trp	Leu	His	Phe	Arg	Pro
		115					120					125			
Leu	Val	Thr	Asp	Lys	Gly	Lys	Arg	Val	Gly	Gly	Ser	Ile	Arg	Pro	Trp
	130					135					140				
Lys	Gln	Met	Tyr	Val	Val	Leu	Arg	Gly	His	Ser	Leu	Tyr	Leu	Tyr	Lys
145					150					155					160
Asp	Lys	Arg	Glu	Gln	Thr	Thr	Pro	Ser	Glu	Glu	Gln	Pro	Ile	Ser	
			165						170				175		
Val	Asn	Ala	Cys	Leu	Ile	Asp	Ile	Ser	Tyr	Ser	Glu	Thr	Lys	Arg	Lys
		180						185					190		
Asn	Val	Phe	Arg	Leu	Thr	Thr	Ser	Asp	Cys	Glu	Cys	Leu	Phe	Gln	Ala
	195						200					205			
Glu	Asp	Arg	Asp	Asp	Met	Leu	Ala	Trp	Ile	Lys	Thr	Ile	Gln	Glu	Ser
	210					215					220				
Ser	Asn	Leu	Asn	Glu	Glu	Asp	Thr	Gly	Val	Thr	Asn	Arg	Asp	Leu	Ile
225					230					235					240
Ser	Arg	Arg	Ile	Lys	Glu	Tyr	Asn	Asn	Leu	Met	Ser	Lys	Ala	Glu	Gln
			245						250					255	
Leu	Pro	Lys	Thr	Pro	Arg	Gln	Ser	Leu	Ser	Ile	Arg	Gln	Thr	Leu	Leu
		260						265					270		
Gly	Ala	Lys	Ser	Glu	Pro	Lys	Thr	Gln	Ser	Pro	His	Ser	Pro	Lys	Glu
	275						280					285			
Glu	Ser	Glu	Arg	Lys	Leu	Leu	Ser	Lys	Asp	Asp	Thr	Ser	Pro	Pro	Lys
	290					295					300				
Asp	Lys	Gly	Thr	Trp	Arg	Lys	Gly	Ile	Pro	Ser	Ile	Met	Arg	Lys	Thr
305					310					315					320
Phe	Glu	Lys	Lys	Pro	Thr	Ala	Thr	Gly	Thr	Phe	Gly	Val	Arg	Leu	Asp
			325						330					335	
Asp	Cys	Pro	Pro	Ala	His	Thr	Asn	Arg	Tyr	Ile	Pro	Leu	Ile	Val	Asp
		340						345					350		
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Tyr	Arg	Val	Pro	Gly	Asn	Asn	Ala	Ala	Ile	Ser	Ser	Met	Gln	Glu	Glu
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385					390					395					400
Asp	Leu	Asn	Val	Ile	Ser	Ser	Leu	Leu	Lys	Ser	Phe	Phe	Arg	Lys	Leu
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Pro	Glu	Pro	Leu	Phe	Thr	Asn	Asp	Lys	Tyr	Ala	Asp	Phe	Ile	Glu	Ala
		420						425					430		
Asn	Arg	Lys	Glu	Asp	Pro	Leu	Asp	Arg	Leu	Lys	Thr	Leu	Lys	Arg	Leu
		435					440					445			
Ile	His	Asp	Leu	Pro	Glu	His	His	Tyr	Glu	Thr	Leu	Lys	Phe	Leu	Ser
	450					455					460				
Ala	His	Leu	Lys	Thr	Val	Ala	Glu	Asn	Ser	Glu	Lys	Asn	Lys	Met	Glu
465					470					475					480
Pro	Arg	Asn	Leu	Ala	Ile	Val	Phe	Gly	Pro	Thr	Leu	Val	Arg	Thr	Ser
			485						490					495	
Glu	Asp	Asn	Met	Thr	His	Met	Val	Thr	His	Met	Pro	Asp	Gln	Tyr	Lys

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Ile Val Glu Thr Leu Ile Gln His His Asp Trp Phe Phe Thr Glu Glu					
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Gly Ala Glu Glu Pro Leu Thr Thr Val Gln Glu Glu Ser Thr Val Asp					
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Ser Gln Pro Val Pro Asn Ile Asp His Leu Leu Thr Asn Ile Gly Arg					
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Thr Gly Val Ser Pro Gly Asp Val Ser Asp Ser Ala Thr Ser Asp Ser					
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Thr Lys Ser Lys Gly Ser Trp Gly Ser Gly Lys Asp Gln Tyr Ser Arg					
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Glu Leu Leu Val Ser Ser Ile Phe Ala Ala Ala Ser Arg Lys Arg Lys					
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Lys Pro Lys Glu Lys Ala Gln Pro Ser Ser Ser Glu Asp Glu Leu Asp					
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Asn Val Phe Phe Lys Lys Glu Asn Val Glu Gln Cys His Asn Asp Thr					
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Lys Glu Glu Ser Lys Lys Glu Ser Glu Thr Leu Gly Arg Lys Gln Lys					
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Ile Ile Ile Ala Lys Glu Asn Ser Thr Arg Lys Asp Pro Ser Thr Thr					
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Lys Asp Glu Lys Ile Ser Leu Gly Lys Glu Ser Thr Pro Ser Glu Glu					
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Pro Ser Pro Pro His Asn Ser Lys His Asn Lys Ser Pro Thr Leu Ser					
	690		695		700
Cys Arg Phe Ala Ile Leu Lys Glu Ser Pro Arg Ser Leu Leu Ala Gln					
705		710		715	720
Lys Ser Ser His Leu Glu Glu Thr Gly Ser Asp Ser Gly Thr Leu Leu					
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Ser Thr Ser Ser Gln Ala Ser Leu Ala Arg Phe Ser Met Lys Lys Ser					
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Thr Ser Pro Glu Thr Lys His Ser Glu Phe Leu Ala Asn Val Ser Thr					
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Ile Thr Ser Asp Tyr Ser Thr Thr Ser Ser Ala Thr Tyr Leu Thr Ser					
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Leu Asp Ser Ser Arg Leu Ser Pro Glu Val Gln Ser Val Ala Glu Ser					
785		790		795	800
Lys Gly Asp Glu Ala Asp Asp Glu Arg Ser Glu Leu Ile Ser Glu Gly					
	805		810		815
Arg Pro Val Glu Thr Asp Ser Gly Asn Glu Phe Pro Ile Phe Pro Thr					
	820		825		830
Ala Leu Thr Ser Glu Arg Leu Phe Arg Gly Glu Leu Gln Lys Val Thr					
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<211> 380

<212> DNA

<213> Homo sapiens

<400> 2849

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<210> 2850

<211> 76

<212> PRT

<213> Homo sapiens

<400> 2850

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			20					25					30		
Glu	Glu	Asp	Lys	Lys	Asp	Gly	Lys	Glu	Pro	Ser	Asp	Lys	Pro	Gln	Lys
		35					40					45			
Ala	Val	Gln	Asp	His	Lys	Glu	Pro	Ser	Asp	Lys	Pro	Gln	Lys	Ala	Val
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<210> 2851

<211> 2459

<212> DNA

<213> Homo sapiens

<400> 2851

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 180
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 240
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<210> 2852

<211> 317

<212> PRT

<213> Homo sapiens

<400> 2852

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			20					25					30		
Leu	Tyr	Met	Leu	Val	Lys	Met	Ser	His	His	Val	Trp	Thr	Ala	Gln	Asn
		35					40					45			
Val	Asp	Pro	Ala	Ser	Phe	Leu	Ser	Thr	Thr	Leu	Gly	Asn	Val	Leu	Val
	50					55					60				
Thr	Val	Lys	Arg	Asn	Phe	Asp	Lys	Cys	Ile	Ser	Asn	Gln	Ile	Arg	Gln
65				70					75					80	
Met	Glu	Glu	Val	Lys	Ile	Ser	Lys	Lys	Ser	Lys	Val	Gly	Ile	Leu	Pro
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Phe	Val	Ala	Glu	Phe	Glu	Glu	Phe	Ala	Gly	Leu	Ala	Glu	Ser	Ile	Phe
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Lys	Asn	Ala	Glu	Arg	Arg	Gly	Asp	Leu	Asp	Lys	Ala	Tyr	Thr	Lys	Leu
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Ile	Arg	Gly	Val	Phe	Val	Asn	Val	Glu	Lys	Val	Ala	Asn	Glu	Ser	Gln
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Lys	Thr	Pro	Arg	Asp	Val	Val	Met	Met	Glu	Asn	Phe	His	His	Ile	Phe
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		275					280						285		
Ala	Arg	Cys	Tyr	Pro	Gly	Ser	Gly	Val	Thr	Met	Glu	Phe	Thr	Ile	Gln

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<210> 2853

<211> 4993

<212> DNA

<213> Homo sapiens

<400> 2853

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<210> 2854

<211> 1235

<212> PRT

<213> Homo sapiens

<400> 2854

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			20					25					30		
Glu	Ile	Gly	His	Gly	Ser	Phe	Gly	Ala	Val	Tyr	Phe	Ala	Arg	Asp	Val
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Arg	Asn	Ser	Glu	Val	Val	Ala	Ile	Lys	Lys	Met	Ser	Tyr	Ser	Gly	Lys
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Gln	Ser	Asn	Glu	Lys	Trp	Gln	Asp	Ile	Ile	Lys	Glu	Val	Arg	Phe	Leu
	65				70					75				80	
Gln	Lys	Leu	Arg	His	Pro	Asn	Thr	Ile	Gln	Tyr	Arg	Gly	Cys	Tyr	Leu
			85						90					95	
Arg	Glu	His	Thr	Ala	Trp	Leu	Val	Met	Glu	Tyr	Cys	Leu	Gly	Ser	Ala
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	115						120					125			
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His	Asn	Met	Ile	His	Arg	Asp	Val	Lys	Ala	Gly	Asn	Ile	Leu	Leu	Ser
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Pro Arg Thr Thr Gln His Pro Leu Ala Leu Leu Ala Arg Val Trp Val						
	1140		1145		1150	
Leu Cys Lys Gly Trp Asn Trp Arg Leu Ala Arg Ala Ser Gln Gly Leu						
	1155		1160		1165	
Ala Ser His Leu Pro Pro Trp Ala Ile His Thr Leu Ala Ser Trp Gly						
	1170		1175		1180	
Leu Leu Arg Gly Glu Arg Pro Thr Arg Ile Pro Arg Leu Leu Pro Arg						
1185		1190		1195		1200
Ser Gln Arg Gln Leu Gly Pro Pro Ala Ser His Gln Pro Leu Pro Gly						
	1205		1210		1215	
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<210> 2855

<211> 1676

<212> DNA

<213> Homo sapiens

<400> 2855

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<210> 2856

<211> 401

<212> PRT

<213> Homo sapiens

<400> 2856

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			20					25					30		
Gln	Thr	Ile	Thr	Gly	Ser	Asp	Pro	Glu	Glu	Ala	Ile	Phe	Asp	Thr	Leu
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Cys	Thr	Asp	Asp	Ser	Ser	Glu	Glu	Ala	Lys	Thr	Leu	Thr	Met	Asp	Ile
	50				55					60					
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65				70				75						80	
Ser	Ser	Ala	Ser	Ser	Asp	Gly	Pro	His	Pro	Val	Ile	Thr	Pro	Ser	Arg
			85					90					95		
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		100						105					110		
Pro	Ser	Arg	Ala	Ser	Glu	Ser	Ser	Ala	Ser	Ser	Asp	Gly	Pro	His	Pro
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Val	Ile	Thr	Pro	Ser	Trp	Ser	Pro	Gly	Ser	Asp	Val	Thr	Leu	Leu	Ala
	130				135					140					
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<212> PRT

<213> Homo sapiens

<400> 2858

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			20					25						30	
Pro	Glu	Cys	Ser	Val	Lys	Gly	Arg	Thr	Glu	Ser	Phe	His	Cys	Pro	Pro
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Asp Cys Cys Tyr Ser Asp Asp Gly Pro Thr Thr Glu Gly Ile Asp Leu		
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Asn Asp Pro Ala Ile Lys Gln Asp Ala Leu Leu Leu Glu Arg Trp Ile		
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	130	135
Thr Leu Leu Leu Ala Val Arg Ser Phe Val Phe Phe Ser Gln Leu Ser		
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	165	170
Arg Ile Ser Ala Ala Asp Val Asp Leu Gln Trp Asn Phe Ser Gln Thr		
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<212> DNA

<213> Homo sapiens

<400> 2859

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<212> PRT

<213> Homo sapiens

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			20					25					30		
Asp	Ile	Ser	Ala	Arg	Lys	Met	Ala	His	Pro	Ala	Met	Phe	Pro	Arg	Arg
		35					40					45			
Gly	Ser	Gly	Ser	Gly	Ser	Ala	Ser	Ala	Leu	Asn	Ala	Ala	Gly	Thr	Gly
	50					55					60				
Val	Gly	Ser	Asn	Ala	Thr	Ser	Ser	Glu	Asp	Phe	Pro	Pro	Pro	Ser	Leu
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Leu	Gln	Pro	Pro	Pro	Pro	Ala	Ala	Ser	Ser	Thr	Ser	Gly	Pro	Gln	Pro
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	130					135					140				
Asn	Asn	Ser	Ile	Ala	Glu	Asp	Thr	Glu	Ser	Tyr	Asp	Asp	Leu	Asp	Glu
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Ser	His	Thr	Glu	Asp	Leu	Ser	Ser	Ser	Glu	Ile	Leu	Asp	Val	Ser	Leu
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Thr	Leu	Asn	Asn	Phe	Gln	Glu	Ala	Glu	Thr	Pro	Gly	Ala	Val	Ser	Pro
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Asn	Gln	Pro	His	Leu	Pro	Gln	Pro	His	Leu	Pro	His	Leu	Pro	Gln	Gln
	210					215					220				
Asn	Val	Val	Ile	Asn	Gly	Asn	Ala	His	Pro	His	His	Leu	His	His	His
225					230					235					240
His	Gln	Ile	His	His	Gly	His	His	Leu	Gln	His	Gly	His	His	His	Pro
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Ser	His	Val	Ala	Val	Ala	Ser	Ala	Ser	Ile	Thr	Gly	Gly	Pro	Pro	Ser
			260					265					270		
Ser	Pro	Val	Ser	Arg	Lys	Leu	Ser	Thr	Thr	Gly	Ser	Ser	Asp	Ser	Ile
		275					280					285			
Thr	Pro	Val	Ala	Pro	Thr	Ser	Ala	Val	Ser	Ser	Ser	Gly	Ser	Pro	Ala

290 295 300
 Ser Val Met Thr Asn Met Arg Ala Pro Ser Thr Thr Gly Gly Ile Gly
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<210> 2861
 <211> 756
 <212> DNA
 <213> Homo sapiens

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 <211> 252
 <212> PRT
 <213> Homo sapiens

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 Ser Glu Ala Leu Ala Val Ile Asn Gly Asn Lys Gly Pro Pro Val
 35 40 45
 Gly Ser Arg Ile Ser Met Pro Thr Thr Lys Pro Arg Pro Gly Leu Arg

50		55		60	
Glu	Glu	Lys	Leu	Ala	Ser
65		70		75	
Lys	Lys	Leu	Asp	Ser	Thr
		85		90	
Gly	His	Thr	Gly	Pro	Val
		100		105	
Gly	Ile	Ser	Ser	Gly	Leu
		115		120	
Val	Ser	Leu	Glu	Pro	Leu
		130		135	
Arg	Ser	Ser	Gln	Ile	His
145		150		155	
Ser	Ser	Ser	Gln	Ala	Gln
		165		170	
Ser	Glu	Ala	Gln	Asp	Ala
		180		185	
Gln	His	Ser	Ala	Val	Gln
		195		200	
Ile	Ser	Lys	Ser	Gln	Thr
		210		215	
Gln	Leu	Ser	Cys	Ser	Ser
225		230		235	
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<210> 2863

<211> 711

<212> DNA

<213> Homo sapiens

<400> 2863

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<211> 237

<212> PRT

<213> Homo sapiens

<400> 2864

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		20					25						30		
Ser	Gly	Arg	Ile	Val	Trp	Ser	Pro	Ala	Val	Pro	Gly	Ile	Pro	Val	Arg
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Thr	Ala	Cys	Tyr	Cys	His	His	Lys	His	Leu	Cys	Cys	Ser	Ser	Ser	Tyr
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Ile	Pro	Gln	Ser	Arg	Leu	Arg	Tyr	Thr	Pro	His	Pro	Ala	Tyr	Ala	Thr
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Phe	Cys	Arg	Pro	Lys	Glu	Asn	Trp	Trp	Gln	Tyr	Thr	Gln	Gly	Arg	Arg
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Gly	Lys	Asn	Val	Ser	Ser	Ile	Leu	Gly	Phe	Asp	Ser	Asn	Gln	Leu	Pro
			165						170					175	
Ala	Asn	Ala	Pro	Ile	Glu	Asp	Arg	Arg	Ser	Ala	Ala	Thr	Cys	Leu	Gln
			180					185					190		
Thr	Arg	Gly	Met	Leu	Leu	Gly	Val	Phe	Asp	Gly	His	Ala	Gly	Cys	Ala
	195					200						205			
Cys	Ser	Gln	Ala	Val	Ser	Glu	Arg	Leu	Phe	Tyr	Tyr	Ile	Ala	Val	Ser
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<210> 2865

<211> 585

<212> DNA

<213> Homo sapiens

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<211> 134

<212> PRT

<213> Homo sapiens

<400> 2866

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			20					25					30		
Ser	Asp	His	Gln	Ser	Arg	Cys	Asn	Gln	Gly	Cys	Val	Ser	Arg	Ser	Lys
		35					40					45			
Arg	Asp	Ile	Ser	Ser	Tyr	Lys	Trp	Lys	Thr	Asp	Ser	Ile	Ile	Gly	Pro
	50					55				60					
Ile	Arg	Leu	Lys	Arg	Asp	Arg	Ser	Ala	Ser	Gly	Asn	Ser	Gly	Phe	Gln
65				70					75					80	
His	Glu	Thr	His	Ala	Glu	Glu	Thr	Pro	Asn	Gln	Pro	Phe	Asn	Ser	Val
			85					90					95		
His	Leu	Phe	Ser	Phe	Met	Val	Leu	Ala	Leu	Asn	Val	Val	Thr	Val	Ala
			100					105					110		
Thr	Ile	Thr	Val	Arg	His	Phe	Val	Asn	Gln	Arg	Ala	Asp	Tyr	Lys	Tyr
		115					120					125			
Gln	Lys	Leu	Gln	Asn	Tyr										
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<210> 2867

<211> 444

<212> DNA

<213> Homo sapiens

<400> 2867

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<210> 2868

<211> 84

<212> PRT

<213> Homo sapiens

<400> 2868

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Lys	Gly	Glu	Glu	Leu	Ser	Ala	Ala	Ala	Ile	Lys	Arg	Ile	Val	Ala	Thr
		20						25					30		
Ala	Lys	Ala	Ser	Gly	Lys	Lys	Leu	Gln	Lys	Val	Thr	Leu	Lys	Val	Ser
		35					40					45			
Pro	Arg	Gly	Ile	Ile	Leu	His	Pro	Gly	His	His	Pro	Ala	Pro	Arg	Gln
	50					55					60				
His	Cys	Cys	His	Ser	Arg	Leu	Val	Ala	Ala	Ala	Pro	Arg	Pro	Cys	Trp
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Trp	Cys	Trp	Arg												

<210> 2869

<211> 5811

<212> DNA

<213> Homo sapiens

<400> 2869

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<211> 258

<212> PRT

<213> Homo sapiens

<400> 2870

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		20						25					30		
Ser	Lys	Arg	Phe	Lys	Thr	Met	Ser	Pro	Ser	Gln	Met	Ile	Met	Pro	Asn
		35				40						45			
Val	Met	Glu	Met	Ile	Ala	Ala	Leu	Gly	Pro	Gly	Pro	Ser	Pro	Tyr	Pro
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Ser	His	Pro	Pro	Asp	Met	Pro	Asn	Asn	Met	Ala	Ala	Leu	Glu	Lys	Pro
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Leu	Ser	His	Pro	Met	Gln	Glu	Thr	Met	Pro	His	Ala	Gly	Ser	Ser	Asp
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Gln	Pro	His	Pro	Ser	Ile	Gln	Gln	Gly	Leu	His	Val	Pro	His	Pro	Ser
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Ser	Gln	Ser	Gly	Pro	Pro	Leu	His	His	Ser	Gly	Ala	Pro	Pro	Pro	Pro
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Pro	Ser	Gln	Pro	Pro	Arg	Gln	Pro	Pro	Gln	Ala	Ala	Pro	Ser	Ser	His
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Pro	His	Ser	Asp	Leu	Thr	Phe	Asn	Pro	Ser	Ser	Ala	Leu	Glu	Gly	Gln
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Ala	Gly	Ala	Gln	Gly	Ala	Ser	Asp	Met	Pro	Glu	Pro	Ser	Leu	Asp	Leu
	210					215					220				
Leu	Pro	Glu	Leu	Thr	Asn	Pro	Asp	Glu	Leu	Leu	Ser	Tyr	Leu	Asp	Pro
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Pro	Asp	Leu	Pro	Ser	Asn	Ser	Asn	Asp	Asp	Leu	Leu	Ser	Leu	Phe	Glu
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<210> 2871

<211> 786

<212> DNA

<213> Homo sapiens

<400> 2871

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<210> 2872

<211> 153

<212> PRT

<213> Homo sapiens

<400> 2872

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Ile Ser Pro Asp Ala Phe Phe Gln Ile Asn Thr Ala Gly Ala Glu Met
      35           40           45
Leu Tyr Trp Thr Val Gly Glu Leu Thr Gly Val Asn Ser Asp Thr Ile
      50           55           60
Leu Leu Asp Ile Cys Cys Gly Thr Gly Val Ile Gly Leu Pro Leu Ala
      65           70           75           80
Gln His Thr Ser Arg Val Leu Gly Ile Glu Leu Leu Glu Gln Ala Val
      85           90           95
Glu Asp Ala Arg Trp Thr Ala Ala Phe Asn Gly Ile Thr Asn Ser Glu
      100          105          110
Phe His Thr Gly Gln Ala Glu Lys Ile Leu Pro Gly Leu Leu Lys Ser
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Lys Glu Asp Gly Gln Ser Ile Val Ala Val Val Asn Pro Ala Arg Ala

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 <213> Homo sapiens

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<213> Homo sapiens

<400> 2874

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          20           25           30
Lys Leu Lys Ala Ser Ser Arg Thr Ser Ala Leu Leu Ser Gly Phe Ala
          35           40           45
Met Val Ala Met Val Glu Val Gln Leu Asp Ala Asp His Asp Tyr Pro
          50           55           60
Pro Gly Leu Leu Ile Ala Phe Ser Ala Cys Thr Thr Val Leu Val Ala
65           70           75           80
Gly His Leu Phe Ala Leu Met Ile Ser Thr Cys Ile Leu Pro Asn Ile
          85           90           95
Glu Ala Val Ser Asn Cys Thr Ile Ser Thr Arg Lys Glu Ser Pro His
          100          105          110
Glu Arg Met His Arg His Ile Glu Leu Ala Trp Ala Phe Ser Thr Val
          115          120          125
Ile Gly Thr Leu Leu Phe Leu Ala Glu Val Val Leu Leu Cys Trp Val
          130          135          140
Lys Phe Leu Pro Leu Lys Lys Gln Pro Gly Gln Pro Arg Pro Thr Ser
145          150          155          160
Lys Pro Pro Ala Ser Gly Ala Ala Ala Asn Val Ser Thr Ser Gly Ile
          165          170          175
Thr Pro Gly Gln Ala Ala Ala Ile Ala Ser Thr Thr Ile Met Val Pro
          180          185          190
Phe Gly Leu Ile Phe Ile Val Phe Ala Val His Phe Tyr Arg Ser Leu
          195          200          205
Val Ser His Lys Thr Asp Arg Gln Phe Gln Glu Leu Asn Glu Leu Ala
          210          215          220
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<212> DNA

<213> Homo sapiens

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<210> 2876

<211> 193

<212> PRT

<213> Homo sapiens

<400> 2876

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			20					25					30		
Glu	Gln	Ser	Glu	Thr	Val	Ser	Leu	Ser	Glu	Asp	Glu	Thr	Phe	Ser	Trp
			35				40					45			
Pro	Gly	Pro	Lys	Thr	Val	Thr	Leu	Lys	Arg	Thr	Ser	Gln	Gly	Phe	Gly
	50					55					60				
Phe	Thr	Leu	Arg	His	Phe	Ile	Val	Tyr	Pro	Pro	Glu	Ser	Ala	Ile	Gln
65					70				75						80
Phe	Ser	Tyr	Lys	Asp	Glu	Glu	Asn	Gly	Asn	Arg	Gly	Gly	Lys	Gln	Arg
			85					90					95		
Asn	Arg	Leu	Glu	Pro	Met	Asp	Thr	Ile	Phe	Val	Lys	Gln	Val	Lys	Glu
			100					105					110		
Gly	Gly	Pro	Ala	Phe	Glu	Ala	Gly	Leu	Cys	Thr	Gly	Asp	Arg	Ile	Ile
		115					120					125			
Lys	Val	Asn	Gly	Glu	Ser	Val	Ile	Gly	Lys	Thr	Tyr	Ser	Gln	Val	Ile
	130					135					140				
Ala	Leu	Ile	Gln	Asn	Ser	Asp	Thr	Thr	Leu	Glu	Leu	Ser	Val	Met	Pro
145					150				155						160
Lys	Asp	Glu	Asp	Ile	Leu	Gln	Val	Val	Ser	Phe	Ile	Tyr	Ser	Tyr	Met
			165					170					175		
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<210> 2877

<211> 1921

<212> DNA

<213> Homo sapiens

<400> 2877

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<210> 2878

<211> 451

<212> PRT

<213> Homo sapiens

<400> 2878

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			20				25					30			
Thr	Glu	Glu	Gly	Lys	Glu	Val	Trp	Asp	Tyr	Val	Thr	Val	Arg	Lys	Asp
		35				40					45				
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	50					55					60				
Ser	Glu	Leu	Pro	Leu	Val	Met	Trp	Leu	Gln	Gly	Gly	Pro	Gly	Gly	Ser
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Ser	Thr	Gly	Phe	Gly	Asn	Phe	Glu	Glu	Ile	Gly	Pro	Leu	Asp	Ser	Asp
				85					90					95	
Leu	Lys	Pro	Arg	Lys	Thr	Thr	Trp	Leu	Gln	Ala	Ala	Ser	Leu	Leu	Phe
			100					105					110		
Val	Asp	Asn	Pro	Val	Gly	Thr	Gly	Phe	Ser	Tyr	Val	Asn	Gly	Ser	Gly
		115					120					125			
Ala	Tyr	Ala	Lys	Asp	Leu	Ala	Met	Val	Ala	Ser	Asp	Met	Met	Val	Leu
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Leu	Lys	Thr	Phe	Phe	Ser	Cys	His	Lys	Glu	Phe	Gln	Thr	Val	Pro	Phe
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Tyr	Ile	Phe	Ser	Glu	Ser	Tyr	Gly	Gly	Lys	Met	Ala	Ala	Gly	Ile	Gly
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	210					215					220				
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Gln	Ser	His	Leu	Val	Cys	Leu	Cys	Gln	Arg	His	Val	Arg	His	Leu	Gln
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Lys	Ile	Ile	Pro	Glu	Asp	Gln	Ser	Trp	Gly	Gly	Gln	Ala	Thr	Asn	Val

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Phe Val Asn Met Glu Glu Asp Phe Met Lys Pro Val Ile Asp Ile Val					
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Asp Thr Leu Leu Glu Ala Gly Val Asn Val Thr Val Tyr Asn Gly Gln					
	355		360		365
Leu Asp Leu Ile Val Asp Thr Ile Gly Gln Glu Ala Trp Val Arg Lys					
	370		375		380
Leu Lys Trp Pro Glu Leu Ser Arg Phe Asn Gln Leu Lys Trp Lys Ala					
385		390		395	400
Leu Tyr Ser Asp Pro Lys Ser Leu Glu Thr Ser Ala Phe Val Lys Ser					
	405		410		415
Tyr Lys Asn Leu Ala Phe Tyr Trp Ile Leu Lys Ala Gly His Met Val					
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Pro Ser Asp Gln Gly Asp Met Ala Leu Lys Met Met Arg Leu Val Thr					
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<210> 2879

<211> 1352

<212> DNA

<213> Homo sapiens

<400> 2879

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<211> 376

<212> PRT

<213> Homo sapiens

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			20					25					30		
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Ala	Arg	Gly	Glu	Arg	Pro	Pro	Arg	Leu	Gly	Leu	Pro	Thr	Pro	Gly	Val
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Pro	Val	Xaa	Asp	Lys	Tyr	Ala	Pro	Lys	Leu	Asp	Ser	Pro	Tyr	Phe	Arg
				85				90						95	
His	Ser	Ser	Val	Ser	Phe	Phe	Pro	Ser	Phe	Pro	Pro	Ala	Ile	Pro	Gly
			100					105					110		
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Tyr	Arg	Ala	Val	Val	Lys	Lys	Pro	Gly	Arg	Trp	Cys	Ala	Val	His	Val
			165					170						175	
Gln	Ile	Ala	Trp	Gln	Ile	Tyr	Arg	His	Gln	Gln	Lys	Ile	Lys	Glu	Met
		180					185					190			
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	195						200					205			
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	210					215					220				
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<211> 96

<212> PRT

<213> Homo sapiens

<400> 2882

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			20					25				30			
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		35					40				45				
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		50				55				60					
Pro	Leu	Asp	Val	Ser	Gly	Gln	Gly	Ser	Gly	Gly	Cys	Ser	Phe	Asp	Lys
65					70				75					80	
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<210> 2883

<211> 516

<212> DNA

<213> Homo sapiens

<400> 2883

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<211> 172

<212> PRT

<213> Homo sapiens

<400> 2884

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			35				40					45			
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Pro	Cys	Gln	Glu	Glu	His	Gly	His	Pro	Arg	Arg	Ile	Pro	His	Leu	Pro
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Gly	His	Pro	Tyr	Ser	Pro	Glu	Tyr	Ala	Pro	Ser	Pro	Leu	His	Cys	Ser
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Ala	Thr	Tyr	His	Pro	Leu	His	Ser	Asn	Leu	Gln	Ala	His	Leu	Gly	Gln
			130				135						140		
Leu	Ser	Pro	Pro	Pro	Glu	His	Pro	Gly	Phe	Asp	Ala	Leu	Asp	Gln	Leu
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<211> 807

<212> DNA

<213> Homo sapiens

<400> 2885

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<210> 2886

<211> 269

<212> PRT

<213> Homo sapiens

<400> 2886

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			20					25					30		
Gly	Arg	Asp	Ala	Glu	Thr	Leu	Gln	Lys	Gln	Lys	Glu	Thr	Ile	Lys	Ala
			35				40					45			
Phe	Leu	Lys	Lys	Leu	Glu	Ala	Leu	Ile	Ala	Ser	Asn	Asp	Asn	Ala	Asn
	50					55					60				
Lys	Thr	Cys	Lys	Met	Met	Leu	Ala	Thr	Glu	Glu	Thr	Ser	Pro	Asp	Leu
65					70					75				80	
Val	Gly	Ile	Lys	Arg	Asp	Leu	Glu	Ala	Leu	Ser	Lys	Gln	Cys	Asn	Lys
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Leu	Leu	Asp	Arg	Ala	Gln	Ala	Arg	Glu	Glu	Gln	Val	Glu	Gly	Thr	Ile
		100						105					110		
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<210> 2887

<211> 1945

<212> DNA

<213> Homo sapiens

<400> 2887

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<211> 315

<212> PRT

<213> Homo sapiens

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			20					25					30		
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			35				40					45			
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Thr	Val	Ser	Ile	Gly	Leu	Ser	Asp	Ser	Pro	Thr	Trp	Arg	His	Cys	Trp
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Met	Thr	Ala	Arg	Ser	Cys	Ser	Gly	Glu	Lys	Gly	Gly	His	Trp	Ala	Pro
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Arg	Gln	Val	Gly	Val	Tyr	Leu	Leu	Pro	Gly	Arg	Val	Gly	Cys	Val	Ser
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Ala	Arg	Arg	Gly	Ser	Ala	Val	Ser	Ala	Leu	Ala	Ser	Gly	Leu	Val	Glu
			130			135					140				
Glu	Pro	Met	Leu	Gly	Pro	Pro	Phe	His	Pro	Thr	Pro	Arg	Phe	Lys	Ala
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				165					170					175	
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Pro Gly Glu	Ala Gly Ala Glu Val	Ser Gly Lys	Leu Val Thr Leu Pro
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<210> 2891

<211> 565

<212> DNA

<213> Homo sapiens

<400> 2891

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 <212> PRT
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<210> 2894

<211> 490

<212> PRT

<213> Homo sapiens

<400> 2894

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Gln	Val	Ser	Val	Ser	Leu	His	Pro	Gly	Thr	Gly	Leu	Phe	Ser	Pro	Phe	
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Cys	Ser	Val	Pro	Leu	Trp	Cys	Ile	Tyr	Phe	Leu	Ser	Phe	Cys	Ile	Val	
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Leu	Ser	Leu	Pro	Ser	Ala	Ser	Leu	His	Leu	Cys	Leu	Ser	Cys	Leu	His	
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Phe	Leu	Asn	Leu	Asp	Cys	Pro	Cys	Leu	Phe	Leu	Cys	His	Ser	Leu	Ser	
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Ser	Pro	Ser	Val	Cys	Gly	Ser	Ala	Ser	Leu	Ser	His	Ser	Pro	Tyr	Asn	
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 <212> DNA
 <213> Homo sapiens

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<210> 2896
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 Gln Glu Leu Ala Gln Asp Ala Val Ala Pro Ala Val Ala Arg Arg Ser

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Gly	Pro	Ala	Leu	Arg	Ser	Gly	Pro	Pro	Leu	Pro	Pro	Pro	Pro	Arg
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<210> 2897

<211> 3184

<212> DNA

<213> Homo sapiens

<400> 2897

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<211> 933

<212> PRT

<213> Homo sapiens

<400> 2898

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Thr	Phe	Ser	Phe	Gln	Ala	Gln	Leu	Cys	Gly	Ser	Lys	Thr	Leu	Leu	Gln
	50					55					60				
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Val	His	Ala	Thr	Leu	Ser	Phe	Gln	Pro	Leu	Lys	Lys	Cys	Val	Leu	Thr
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Asp	Leu	Glu	Leu	Ile	Ile	Lys	Ile	Ser	His	Gly	Pro	Thr	Phe	Met	Cys
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Ser	Tyr	Asn	Phe	Gly	Thr	Cys	Phe	Ile	Tyr	Gln	Ala	Gly	Met	Pro	Pro
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Ile	Asp	Cys	Leu	Tyr	Thr	Asn	Thr	Thr	His	Leu	Glu	Val	Asn	Ser	Arg
			165					170					175		
Val	Asp	Val	Val	Lys	Pro	Gly	Asn	Thr	Leu	Glu	Ile	Pro	Ile	Thr	Phe
			180					185					190		
Tyr	Pro	Arg	Glu	Ser	Ile	Asn	Tyr	Gln	Glu	Leu	Ile	Pro	Phe	Glu	Ile
		195					200					205			
Asn	Gly	Leu	Ser	Gln	Gln	Thr	Val	Glu	Ile	Lys	Gly	Lys	Gly	Thr	Glu

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260	265	270
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275	280	285
Ile Thr Leu Lys Pro	Lys Glu Val Cys Lys	Leu Glu Val Ile Phe Ala
290	295	300
Pro Lys Lys Arg Val	Pro Pro Phe Ser Glu	Glu Val Phe Met Glu Cys
305	310	315
Met Gly Leu Leu Arg	Pro Leu Phe Leu Leu	Ser Gly Cys Cys Gln Ala
325	330	335
Leu Glu Ile Ser Leu	Asp Gln Glu His Ile	Pro Phe Gly Pro Val Val
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Val Gly Ala Arg Phe	Lys Trp Asp Ile Lys	Lys Phe Glu Pro His Phe
370	375	380
Ser Ile Ser Pro Glu	Glu Gly Tyr Ile Thr	Ser Gly Met Glu Val Ser
385	390	395
Phe Glu Val Thr Tyr	His Pro Thr Glu Val	Gly Lys Glu Ser Leu Cys
405	410	415
Lys Asn Ile Leu Cys	Tyr Ile Gln Gly Gly	Ser Pro Leu Ser Leu Thr
420	425	430
Leu Ser Gly Val Cys	Val Gly Pro Pro Ala	Val Lys Glu Val Val Asn
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465	470	475
His Trp Glu Gly Pro	Glu Phe Ile Thr Leu	Glu Ala His Gln Gln Asn
485	490	495
Lys Pro Tyr Glu Ile	Thr Tyr Arg Pro Arg	Thr Met Asn Leu Glu Asn
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Arg Lys His Gln Gly	Thr Leu Phe Pro Leu	Pro Asp Gly Thr Gly
515	520	525
Trp Leu Tyr Ala Leu	His Gly Thr Ser Glu	Leu Pro Lys Ala Val Ala
530	535	540
Asn Ile Tyr Arg Glu	Val Pro Cys Lys Thr	Pro Tyr Thr Glu Leu Leu
545	550	555
Pro Ile Thr Asn Trp	Leu Asn Lys Pro Gln	Arg Phe Arg Val Ile Val
565	570	575
Glu Ile Leu Lys Pro	Glu Lys Pro Asp Leu	Ser Ile Thr Met Lys Gly
580	585	590
Leu Asp Tyr Ile Asp	Val Leu Ser Gly Ser	Lys Lys Asp Tyr Lys Leu
595	600	605
Asn Phe Phe Ser His	Lys Glu Gly Thr Tyr	Ala Ala Lys Val Ile Phe
610	615	620
Arg Asn Glu Val Thr	Asn Glu Phe Leu Tyr	Tyr Asn Val Ser Phe Arg
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<210> 2899

<211> 876

<212> DNA

<213> Homo sapiens

<400> 2899

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<210> 2900

<211> 189

<212> PRT

<213> Homo sapiens

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		20						25					30		
Asp	Glu	Ser	Ser	Val	Lys	Lys	Met	Ile	Leu	Thr	Phe	Glu	Lys	Arg	Ser
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Tyr	Lys	Asn	Gln	Glu	Leu	Arg	Ile	Lys	Phe	Pro	Asp	Asn	Pro	Glu	Lys
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<212> DNA

<213> Homo sapiens

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 agaactttgt gtgcacaacc agtctttctt ttcacaatca tattttaaca gtttatgtaa
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<210> 2902

<211> 158

<212> PRT

<213> Homo sapiens

<400> 2902

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Ala	Glu	Glu	Gly	Pro	Pro	Val	Gln	Ser	Leu	Lys	Gly	Glu	Asp	Ala	Glu
			20					25					30		
Glu	Ser	Leu	Glu	Glu	Glu	Glu	Ala	Leu	Asp	Pro	Leu	Gly	Ile	Met	Arg
		35					40					45			
Ser	Lys	Lys	Pro	Lys	Lys	His	Pro	Lys	Val	Ala	Val	Lys	Ala	Lys	Pro
	50					55					60				
Ser	Pro	Arg	Leu	Thr	Ile	Phe	Asp	Glu	Glu	Val	Asp	Pro	Asp	Glu	Gly
65					70					75				80	
Leu	Phe	Gly	Pro	Gly	Arg	Lys	Leu	Ser	Pro	Gln	Asp	Pro	Ser	Glu	Asp
			85						90					95	
Val	Ser	Ser	Met	Asp	Pro	Leu	Lys	Leu	Phe	Asp	Asp	Pro	Asp	Leu	Gly
			100					105					110		
Gly	Ala	Ile	Pro	Leu	Gly	Asp	Ser	Leu	Leu	Leu	Pro	Ala	Ala	Cys	Glu
		115					120					125			
Ser	Gly	Gly	Pro	Thr	Pro	Ser	Leu	Ser	His	Arg	Asp	Ala	Ser	Lys	Glu

130 135 140
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 145 150 155

<210> 2903
 <211> 542
 <212> DNA
 <213> Homo sapiens

<400> 2903
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 180
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 300
 ggggactacg cgcccatcct ccagaagggtg gtggagcagc tggagaaagc caaggcctat
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 420
 tccatcgagg ccacaagag gggctcccg cttctggatcc aggacaaagg ccccatcg
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 542

<210> 2904
 <211> 180
 <212> PRT
 <213> Homo sapiens

<400> 2904
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 20 25 30
 Ala Lys Leu Ala Gln Asp Phe Leu Asp Ser Gln Asn Leu Ser Ala Tyr
 35 40 45
 Asn Thr Arg Leu Phe Lys Glu Val Asp Gly Glu Gly Lys Pro Tyr Tyr
 50 55 60
 Glu Val Arg Leu Ala Ser Val Leu Gly Ser Glu Pro Ser Leu Asp Ser
 65 70 75 80
 Glu Val Thr Ser Lys Leu Lys Ser Tyr Glu Phe Arg Gly Ser Pro Phe
 85 90 95
 Gln Val Thr Arg Gly Asp Tyr Ala Pro Ile Leu Gln Lys Val Val Glu
 100 105 110
 Gln Leu Glu Lys Ala Lys Ala Tyr Ala Ala Asn Ser His Gln Gly Gln
 115 120 125
 Met Leu Ala Gln Tyr Ile Glu Ser Phe Thr Gln Gly Ser Ile Glu Ala

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      130              135              140
His Lys Arg Gly Ser Arg Phe Trp Ile Gln Asp Lys Gly Pro His Arg
145              150              155              160
Gly Glu Val Arg Arg Gln Leu His Pro Thr Cys Pro Leu Leu Pro Ala
      165              170              175
Pro Pro Ser Arg
      180

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<210> 2905
 <211> 814
 <212> DNA
 <213> Homo sapiens

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<400> 2905
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120
ggattctctc tctgcccagg tttctgctgt cccccaaaaa gaaagacatg tagctgggca
180
tggtggtaca catctgtggt ccagttactc caggaggctg aggcaggagg attgcttgag
240
cccagtggtt caaggttgca gtgggctgtg aatgctctac ttactccag cctgagcaac
300
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360
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420
tccgtccgct gcaggaggag cacacgcccc cgcccgggt cagcaagacg cgagaaagcg
480
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540
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600
taaagcggca cagtcttgag ccttcgctct tcacctaagt cagtgagcgc ccttcgcaaa
660
gcctctgtgg aggtaaccaat tgggggttcg cctccaaatc caggaatgca cctcaaaaat
720
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780
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814

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<210> 2906
 <211> 200
 <212> PRT
 <213> Homo sapiens

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<400> 2906
Phe Ser Tyr Pro Ser Phe Val Tyr Leu Gly Thr Phe Thr Leu Val Asp
1          5          10          15
Asn Arg Ile Pro Val Thr Arg Ser Phe Cys Ile Thr Asn Ser Ala
      20          25          30
Thr Leu Phe Gln Asn Trp Val Ser Gly Phe Leu Leu Cys Pro Gly Phe

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      35              40              45
Cys Cys Pro Pro Lys Arg Lys Thr Cys Ser Trp Ala Trp Trp Tyr Thr
  50              55              60
Ser Val Val Pro Val Thr Gln Glu Ala Glu Ala Gly Gly Leu Leu Glu
  65              70              75              80
Pro Arg Cys Ser Arg Leu Gln Trp Ala Val Asn Ala Leu Leu His Ser
      85              90              95
Ser Leu Ser Asn Arg Ala Arg Pro Arg Pro Ser Ser Arg Leu Ser Ile
      100              105              110
Pro Pro Pro Gln His Pro Phe Leu Leu Glu Met Gly Phe Gly Val Val
      115              120              125
Asn Gln Ala Gln Gly Asn Leu Arg Gly Pro Ala Ser Ser Val Arg Cys
      130              135              140
Arg Arg Ser Thr Arg Pro Arg Pro Gly Ser Ala Arg Arg Glu Lys Ala
      145              150              155              160
Ala Thr Pro Gly Val Arg Glu Leu Arg Leu Glu Gly Ala Trp Gln Ala
      165              170              175
Gly Arg Gly Pro Gly Gly Gly Ser Ala Tyr Asp Arg Arg Trp Gly Glu
      180              185              190
Leu Leu Asp Val Lys Gly Pro Leu
      195              200

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<210> 2907

<211> 379

<212> DNA

<213> Homo sapiens

<400> 2907

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gacgacagag cagatgatgg cacgacgccc tcaaaaccca gacaggcctt cttggcttgc
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<210> 2908

<211> 113

<212> PRT

<213> Homo sapiens

<400> 2908

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Met Thr Val Ser Asp Arg Pro Ser Ala Gly Cys Asp Leu Pro Lys Leu
  1              5              10              15
Met Thr Ala Ser Leu Asn Gly Trp Val Leu Arg Asn Ser Ile Phe Thr
      20              25              30
Phe Pro Arg Leu Leu Ser Asn Phe Gln His Cys Pro Gln Asp Tyr Lys

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[illegible]

<210> 2909

<211> 2420

<212> DNA

<213> Homo sapiens

<400> 2909

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180	cattggggccc	ctgtgagcgg	gacggtggct	gagaccgcct	gctgtggcct	tgcgagttct
240	ctgcactcac	tggcaggggt	ttggtgggaa	acggggaagc	tttggcatgg	ttctgtccag
300	ttgcttataa	tcaagaataa	tgagttttga	ggtttacaaa	gagcagaagt	aacatttata
360	cggtcggcat	ttgacaaaag	attgctgata	atatactcat	tccaggaagt	gtaaaaatgc
420	tttaaaggaa	tgataatttg	tacttactgt	ttatggggac	tagatatatt	agaattatag
480	catcattatg	gggacatagt	gtttccctat	aaattcagaa	attctctggg	tgatgtaaaa
540	tcatacttcc	tggtttttact	taattagtaa	agaaataaat	aaattagagt	aacatttagt
600	caggtagagt	tactcctttt	tccccttctt	tattaataaa	ttttattttt	agcacaatca
660	tttaccceaa	aagagagttt	gagaatgttc	gagaatctct	accactcggg	aaccatgctg
720	gctgttatat	cagaaaaatc	cataaacata	cacagcagcg	agctgttttc	acaagacttc
780	ctgctaataa	acacaacact	ttctcctcca	ctcagatggg	agcctcagat	gccaaaacgc
840	agatgtgcc	actaactata	ggctcgttgc	taagcagaga	aacctatcaa	gtttgtccag
900	caaattcgat	tgtacagtgg	gatggcgtct	gctctgcggc	cttggacagg	gagccactgg
960	tctgtgctgc	tgtcccctga	ggcaggtcga	agctggtggc	ccttagaggg	caggtaaaat
1020	ggttctcatg	ggttagaaca	taagggcttt	gagaaaaaat	gcaaaaggtc	tcattgaaat
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 1260
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 1380
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 1980
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 2280
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<210> 2910

<211> 153

<212> PRT

<213> Homo sapiens

<400> 2910

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	20	25	30
Thr Glu Pro Pro Val Phe Cys Leu Arg Ala Ser Phe Met Ala Trp Thr			
	35	40	45
Gly Asn Ala Met Cys Ser His Lys Cys Thr Thr Ile Val His Gln His			
	50	55	60
Leu Tyr Asn Ile Lys Gly Val Ile Tyr Lys Ser Thr Ala Ile Val His			
65		70	75
Arg Met Val Met Ala Gly Glu Pro Arg Pro Pro Val Leu Cys Ser Phe			
	85	90	95
Ser Thr Gly Glu His Leu Gly Ser Cys His Lys Ala Arg Gly Gly Pro			
	100	105	110
Ser Leu Gly Leu Ser Trp Gly Arg Gln Gln Val Cys Lys Asp Ser Ser			
	115	120	125
Gly Pro Val Leu Thr Gly Ile Arg Gly Gln Glu Arg Gln Val Cys Leu			
	130	135	140
Cys Leu Gly Leu Ile Gly Arg Leu Val			
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<210> 2911

<211> 1327

<212> DNA

<213> Homo sapiens

<400> 2911

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240
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300
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420
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480
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540
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600
acagatatac gacggatttc aggttttagta actgatgtaa tatcattgac agattctgtg
660
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720
cttctttcaa gcagtattga tcgaacagca acgctccgaa agacagcatc tgaaaattca
780
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840

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 960
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 1020
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 1140
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 1327

<210> 2912

<211> 350

<212> PRT

<213> Homo sapiens

<400> 2912

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Ala	Ala	Glu	Pro	Gly	Lys	Arg	Ser	Glu	Gly	Gly	Lys	Thr	Pro	Val	Ala
			20					25					30		
Arg	Ser	Ser	Gly	Gly	Gly	Gly	Trp	Ala	Asp	Pro	Arg	Thr	Cys	Leu	Ser
		35					40					45			
Leu	Leu	Ser	Leu	Gly	Thr	Cys	Leu	Gly	Leu	Ala	Trp	Phe	Val	Phe	Gln
		50				55					60				
Gln	Ser	Glu	Lys	Phe	Ala	Lys	Val	Glu	Asn	Gln	Tyr	Gln	Leu	Leu	Lys
65				70						75				80	
Leu	Glu	Thr	Asn	Glu	Phe	Gln	Gln	Leu	Gln	Ser	Lys	Ile	Ser	Leu	Ile
			85						90					95	
Ser	Glu	Lys	Trp	Gln	Lys	Ser	Glu	Ala	Ile	Met	Glu	Gln	Leu	Lys	Ser
			100					105					110		
Phe	Gln	Ile	Ile	Ala	His	Leu	Lys	Arg	Leu	Gln	Glu	Glu	Ile	Asn	Glu
		115					120					125			
Val	Lys	Thr	Trp	Ser	Asn	Arg	Ile	Thr	Glu	Lys	Gln	Asp	Ile	Leu	Asn
		130				135					140				
Asn	Ser	Leu	Thr	Thr	Leu	Ser	Gln	Asp	Ile	Thr	Lys	Val	Asp	Gln	Ser
145					150					155				160	
Thr	Thr	Ser	Met	Ala	Lys	Asp	Val	Gly	Leu	Lys	Ile	Thr	Ser	Val	Lys
			165						170					175	
Thr	Asp	Ile	Arg	Arg	Ile	Ser	Gly	Leu	Val	Thr	Asp	Val	Ile	Ser	Leu
		180						185					190		
Thr	Asp	Ser	Val	Gln	Glu	Leu	Glu	Asn	Lys	Ile	Glu	Lys	Val	Glu	Lys
		195				200						205			
Asn	Thr	Val	Lys	Asn	Ile	Gly	Asp	Leu	Leu	Ser	Ser	Ser	Ile	Asp	Arg
210					215						220				
Thr	Ala	Thr	Leu	Arg	Lys	Thr	Ala	Ser	Glu	Asn	Ser	Gln	Arg	Ile	Asn

225					230					235					240
Ser	Val	Lys	Lys	Thr	Leu	Thr	Glu	Leu	Lys	Ser	Asp	Phe	Asp	Lys	His
				245					250					255	
Thr	Asp	Arg	Phe	Leu	Ser	Leu	Glu	Gly	Asp	Arg	Ala	Lys	Val	Leu	Lys
			260					265					270		
Thr	Val	Thr	Phe	Ala	Asn	Asp	Leu	Lys	Pro	Lys	Val	Tyr	Asn	Leu	Lys
		275					280					285			
Lys	Asp	Phe	Ser	Arg	Leu	Glu	Pro	Leu	Val	Asn	Asp	Leu	Thr	Leu	Arg
	290					295				300					
Ile	Gly	Arg	Leu	Val	Thr	Asp	Leu	Leu	Gln	Arg	Glu	Lys	Glu	Ile	Ala
305					310					315					320
Phe	Leu	Ser	Glu	Lys	Ile	Ser	Asn	Leu	Thr	Ile	Val	Gln	Ala	Glu	Ile
			325						330					335	
Lys	Asp	Ile	Lys	Asp	Glu	Ile	Ala	His	Ile	Ser	Asp	Met	Asn		
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<210> 2913
<211> 361
<212> DNA
<213> Homo sapiens
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gcttggtctcc ggtccatcct gactgccatt cctaattgatg atccctattt ccatattaca
240
aaaaccatcg agggcctccc gtgtccatct ctttgatatc atcaccacagt accggggcat
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361
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<210> 2914
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<212> PRT
<213> Homo sapiens
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<400> 2914																
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Trp	Val	Met	Ile	Ser	Lys	Arg	Trp	Thr	Arg	Glu	Ala	Leu	Asp	Gly	Phe	
			20					25					30			
Cys	Asn	Met	Glu	Ile	Gly	Ile	Ile	Ile	Arg	Asn	Gly	Ser	Gln	Asp	Gly	
		35				40						45				
Pro	Glu	Pro	Ser	Ile	Ser	Gly	Leu	Lys	Lys	Leu	His	Pro	Gln	Leu	Ser	
	50					55					60					
Leu	Ser	Glu	Asp	Val	His	Ala	Pro	Gln	Val	Ala	Asn	Asp	Thr	Glu	Ala	
65					70					75					80	
Gly	Arg	Lys	Leu	Asp	Val	Gly	Pro	Gln	Leu	Leu	Asp	Gln	Leu	Ala	Gln	

	85		90		95
His Gln Leu His Gly Leu Ala His Phe Val His Asp Ala Leu Asp Asp					
100		105		110	

<210> 2915
 <211> 1782
 <212> DNA
 <213> Homo sapiens

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 180
 gcgcaacaac ttcatcaact tcttgcatctg aaagaacagg aacacaggaa ggaacttgaa
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 300
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 1200
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<210> 2916

<211> 519

<212> PRT

<213> Homo sapiens

<400> 2916

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Ile	Gln	Glu	Val	Glu	Leu	Lys	Ala	Ser	Ala	Ala	Asp	Arg	Glu	Ile	Tyr	35	40	45	
Leu	Leu	Arg	Thr	Ser	Leu	His	Arg	Glu	Arg	Glu	Gln	Ala	Gln	Gln	Leu	50	55	60	
His	Gln	Leu	Leu	Ala	Leu	Lys	Glu	Gln	Glu	His	Arg	Lys	Glu	Leu	Glu	65	70	75	80
Thr	Arg	Glu	Phe	Phe	Thr	Asp	Ala	Asp	Phe	Gln	Asp	Ala	Leu	Ala	Lys	85	90	95	
Glu	Ile	Ala	Lys	Glu	Glu	Lys	Lys	His	Glu	Gln	Met	Ile	Lys	Glu	Tyr	100	105	110	
Gln	Glu	Lys	Ile	Asp	Val	Leu	Ser	Gln	Gln	Tyr	Met	Asp	Leu	Glu	Asn	115	120	125	
Glu	Phe	Arg	Ile	Ala	Leu	Thr	Val	Glu	Ala	Arg	Arg	Phe	Gln	Asp	Val	130	135	140	
Lys	Asp	Gly	Phe	Glu	Asn	Val	Ala	Thr	Glu	Leu	Ala	Lys	Ser	Lys	His	145	150	155	160
Ala	Leu	Ile	Trp	Ala	Gln	Arg	Lys	Glu	Asn	Glu	Ser	Ser	Ser	Leu	Ile	165	170	175	
Lys	Asp	Leu	Thr	Cys	Met	Val	Lys	Glu	Gln	Lys	Thr	Lys	Leu	Ala	Glu	180	185	190	
Val	Ser	Lys	Leu	Lys	Gln	Glu	Thr	Ala	Ala	Asn	Leu	Gln	Asn	Gln	Ile	195	200	205	
Asn	Thr	Leu	Glu	Ile	Leu	Ile	Glu	Asp	Asp	Lys	Gln	Lys	Ser	Ile	Gln	210	215	220	
Ile	Glu	Leu	Leu	Lys	His	Glu	Lys	Val	Gln	Leu	Ile	Ser	Glu	Leu	Ala	225	230	235	240
Ala	Lys	Glu	Ser	Leu	Ile	Phe	Gly	Leu	Arg	Thr	Glu	Arg	Lys	Val	Trp	245	250	255	
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<210> 2917

<211> 2636

<212> DNA

<213> Homo sapiens

<400> 2917

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<210> 2918

<211> 509

<212> PRT

<213> Homo sapiens

<400> 2918

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			20					25					30		
Met	Asp	Glu	Leu	Val	Pro	Leu	Gly	Glu	Leu	Thr	Lys	His	Ser	Thr	Ser
	35						40					45			
Ala	Val	Asp	Leu	Ser	Thr	Xaa	Phe	Ala	Gln	Ile	Ser	His	Thr	Ala	Arg
	50					55					60				
Gln	Leu	Asp	Trp	Pro	Asp	Pro	Glu	Glu	Ala	Phe	Met	Ile	Thr	Val	Lys
65				70					75					80	
Phe	Val	Glu	Asp	Thr	Cys	Arg	Leu	Ala	Leu	Val	Tyr	Cys	Ser	Leu	Ile
			85					90					95		
Lys	Ala	Arg	Ala	Arg	Glu	Leu	Ser	Ser	Gly	Gln	Lys	Asp	Gln	Gly	Gln
		100					105						110		
Ala	Ala	Asn	Met	Leu	Cys	Val	Val	Val	Asn	Asp	Met	Glu	Gln	Leu	Arg
	115						120					125			
Leu	Val	Ile	Gly	Lys	Leu	Pro	Ala	Gln	Leu	Ala	Trp	Glu	Ala	Leu	Glu
	130					135					140				
Gln	Arg	Val	Gly	Ala	Val	Leu	Glu	Gln	Gly	Gln	Leu	Gln	Asn	Thr	Leu
145				150					155					160	
His	Ala	Gln	Leu	Gln	Ser	Ala	Leu	Ala	Gly	Leu	Gly	His	Glu	Ile	Arg
			165					170					175		
Thr	Gly	Val	Arg	Thr	Leu	Ala	Glu	Gln	Leu	Glu	Val	Gly	Ile	Ala	Lys
	180						185						190		
His	Ile	Gln	Lys	Leu	Val	Gly	Val	Arg	Glu	Ser	Val	Leu	Pro	Glu	Asp
	195					200						205			
Ala	Ile	Leu	Pro	Leu	Met	Lys	Phe	Leu	Glu	Val	Glu	Leu	Cys	Tyr	Met

210	215	220
Asn Thr Asn Leu Val	Gln Glu Asn Phe Ser Ser	Leu Leu Thr Leu Leu
225	230	235
Trp Thr His Thr	Leu Thr Val Leu Val	Glu Ala Ala Ala Ser Gln Arg
245	250	255
Ser Ser Ser Leu Ala	Ser Asn Arg Leu Lys Ile	Ala Leu Gln Asn Leu
260	265	270
Glu Ile Cys Phe His	Ala Glu Gly Cys Gly Leu Pro	Pro Lys Ala Leu
275	280	285
His Thr Ala Thr Phe	Gln Ala Leu Gln Arg Asp	Leu Glu Leu Gln Ala
290	295	300
Ala Ser Ser Arg Glu	Leu Ile Arg Lys Tyr Phe	Cys Ser Arg Ile Gln
305	310	315
Gln Gln Ala Glu Thr	Ser Glu Glu Leu Gly Ala	Val Thr Val Lys
325	330	335
Ala Ser Tyr Arg Ala	Ser Glu Gln Lys Leu Arg	Val Glu Leu Leu Ser
340	345	350
Ala Ser Ser Leu Leu	Pro Leu Asp Ser Asn Gly	Ser Ser Asp Pro Phe
355	360	365
Val Gln Leu Thr Leu	Glu Pro Arg His Glu Phe	Pro Glu Leu Ala Ala
370	375	380
Arg Glu Thr Gln Lys	His Lys Lys Asp Leu His	Pro Leu Phe Asp Glu
385	390	395
Thr Phe Glu Phe Leu	Val Pro Ala Glu Pro Cys	Arg Lys Ala Gly Ala
405	410	415
Cys Leu Leu Leu Thr	Val Leu Asp Tyr Asp Thr	Leu Gly Ala Asp Asp
420	425	430
Leu Glu Gly Glu Ala	Phe Leu Pro Leu Arg Glu	Val Pro Gly Leu Ser
435	440	445
Gly Ser Glu Glu Pro	Gly Glu Val Pro Gln Thr	Arg Leu Pro Leu Thr
450	455	460
Tyr Pro Ala Pro Asn	Gly Asp Pro Ile Leu Gln	Leu Leu Glu Gly Arg
465	470	475
Lys Gly Asp Arg Glu	Ala Gln Val Phe Val Arg	Leu Arg Arg His Arg
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500	505	

<210> 2919

<211> 455

<212> DNA

<213> Homo sapiens

<400> 2919

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300

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<210> 2920

<211> 143

<212> PRT

<213> Homo sapiens

<400> 2920

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		20						25					30		
Arg	Gln	Val	Ser	Ser	Leu	Leu	Thr	Asn	His	Leu	Ala	Arg	Ala	Thr	Glu
		35					40					45			
Cys	Cys	Gly	Asn	Gln	Ala	Ala	Gly	Asn	Asp	Ala	Leu	Gln	Asp	Val	Leu
	50					55				60					
Ser	Leu	Leu	Asn	Asp	Leu	Ser	Arg	Ser	His	Ile	Gly	Lys	Ala	Ile	Leu
65					70					75				80	
Ser	Gln	Pro	Ala	Cys	Val	Ser	Lys	Leu	Leu	Ser	Leu	Leu	Leu	Asp	Gln
			85					90						95	
Arg	Pro	Ser	Pro	Lys	Leu	Val	Leu	Ile	Ile	Leu	Gln	Leu	Cys	Arg	Ala
			100					105					110		
Ala	Leu	Pro	Leu	Met	Ser	Val	Glu	Asp	Cys	Gly	Asn	Val	Glu	Leu	Pro
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<210> 2921

<211> 1855

<212> DNA

<213> Homo sapiens

<400> 2921

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<210> 2922

<211> 452

<212> PRT

<213> Homo sapiens

<400> 2922

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Lys	Ile	Val	Arg	Ala	Gln	Gly	Gln	Tyr	Met	Tyr	Asp	Glu	Gln	Gly	Ala		
		35					40					45					
Glu	Tyr	Ile	Asp	Cys	Ile	Ser	Asn	Val	Ala	His	Val	Gly	His	Cys	His		
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Pro	Leu	Val	Val	Gln	Ala	Ala	His	Glu	Gln	Asn	Gln	Val	Leu	Asn	Thr		
65				70				75					80				
Asn	Ser	Arg	Tyr	Leu	His	Asp	Asn	Ile	Val	Asp	Tyr	Ala	Gln	Arg	Leu		
			85					90					95				
Ser	Glu	Thr	Leu	Pro	Glu	Gln	Leu	Cys	Val	Phe	Tyr	Phe	Leu	Asn	Ser		
			100					105					110				
Gly	Ser	Glu	Ala	Asn	Asp	Leu	Ala	Leu	Arg	Leu	Ala	Arg	His	Tyr	Thr		
		115					120					125					
Gly	His	Gln	Asp	Val	Val	Val	Leu	Asp	His	Ala	Tyr	His	Gly	His	Leu		
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Ser	Ser	Leu	Ile	Asp	Ile	Ser	Pro	Tyr	Lys	Phe	Arg	Asn	Leu	Asp	Gly		
145				150						155				160			
Gln	Lys	Glu	Trp	Val	His	Val	Ala	Pro	Leu	Pro	Asp	Thr	Tyr	Arg	Gly		
			165					170					175				
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			180					185					190				
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Ala	Ala	Phe	Phe	Ala	Glu	Ser	Leu	Pro	Ser	Val	Gly	Gly	Gln	Ile	Ile		
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Cys	Val	Ala	Ala	Thr	Gln	Pro	Val	Ala	Arg	Ala	Phe	Glu	Ala	Thr	Gly		
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Gly	Leu	Ala	Val	Leu	Asn	Val	Leu	Glu	Lys	Glu	Gln	Leu	Gln	Asp	His		
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Met	Cys	Phe	Ser	Leu	Asp	Asn	Ala	Arg	Gln	Val	Val	Ala	Lys	Leu	Asp		
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440

445

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<211> 572
<212> DNA
<213> Homo sapiens

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<210> 2924
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<212> PRT
<213> Homo sapiens

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Arg Arg Thr Gly Ser Thr Ala Ala Pro Ala Ser Ala Pro Pro Ile Ala
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<210> 2925
<211> 1999
<212> DNA
<213> Homo sapiens

<400> 2925

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<210> 2926

<211> 305

<212> PRT

<213> Homo sapiens

<400> 2926

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His	Gly	Phe	Glu	Lys	Pro	Leu	Asp	Ser	Ala	Met	Ser	Ala	Glu	Glu	Asp
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Gly	Arg	Arg	Leu	Ser	Gly	Glu	Glu	Arg	Gly	Leu	Trp	Ser	Thr	Asp	Ser
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Arg	Glu	Glu	Ile	Pro	Leu	Asp	Phe	Lys	Thr	Ile	Asp	Asp	His	Lys	Thr

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Thr	Asp	Thr	Trp	Ala	Tyr	Ile	Ala	Ala	Glu	Gly	Asp	Gln	Glu	Val	Leu
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<210> 2927

<211> 1084

<212> DNA

<213> Homo sapiens

<400> 2927

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<210> 2928
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<400> 2928

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          35          40          45
Glu Ala Ile Met Ala Gln Gln Asp Arg Ile Gln Gln Glu Ile Ala Val
          50          55          60
Gln Asn Pro Leu Val Ser Glu Arg Leu Glu Leu Ser Val Leu Tyr Lys
65          70          75          80
Glu Tyr Ala Glu Asp Asp Asn Ile Tyr Gln Gln Lys Ile Lys Asp Leu
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His Lys Lys Tyr Ser Tyr Ile Arg Lys Thr Arg Pro Asp Gly Asn Cys
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Phe Tyr Arg Ala Phe Gly Phe Ser His Leu Glu Ala Leu Leu Asp Asp
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Asn Thr Phe Met Asp Leu Ile Glu Gln Val Glu Lys Gln Thr Ser Val
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Ala Asp Leu Leu Ala Ser Phe Asn Asp Gln Ser Thr Ser Asp Tyr Leu
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Val Val Tyr Leu Arg Leu Leu Thr Ser Gly Tyr Leu Gln Arg Glu Ser
          195          200          205
Lys Phe Phe Glu His Phe Ile Glu Gly Gly Arg Thr Val Lys Glu Phe
          210          215          220
Cys Gln Gln Glu Val Glu Pro Met Cys Lys Glu Ser Asp His Ile His
          225          230          235          240
Ile Ile Ala Leu Ala Gln Ala Leu Ser Val Ser Ile Gln Val Glu Tyr
          245          250          255
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<210> 2929
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 <213> Homo sapiens

<400> 2929

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<210> 2930
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 <212> PRT
 <213> Homo sapiens

<400> 2930

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      20          25          30
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      35          40          45
Gln Lys Glu Asn Met Ile Asp Lys Asp Val Glu Leu Ser Val Val Leu
      50          55          60
Pro Gly Asp Ile Ile Lys Ser Thr Thr Val His Gly Ser Lys Pro Met
      65          70          75          80
Met Asp Leu Leu Ile Phe Leu Cys Ala Gln Tyr His Leu Asn Pro Ser
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Ser Tyr Thr Ile Asp Leu Leu Ser Ala Glu Gln Asn His Ile Lys Phe
      100          105          110
Lys Pro Asn Thr Pro Ile Gly Met Leu Glu Val Glu Lys Val Ile Leu
      115          120          125
Lys Pro Lys Met Leu Asp Lys Lys Lys Pro Thr Pro Ile Ile Pro Glu
      130          135          140
Lys Thr Val Arg Val Val Ile Asn Phe Lys Lys Thr Gln Lys Thr Ile
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Val Arg Val Ser Pro His Ala Ser Leu Gln Glu Leu Ala Pro Ile Ile
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Cys Ser Lys Cys Glu Phe Asp Pro Leu His Thr Leu Leu Leu Lys Asp
      180          185          190
Tyr Gln Ser Gln Glu Pro Leu Asp Leu Thr Lys Ser Leu Asn Asp Leu
      195          200          205
Gly Leu Arg Glu Leu Tyr Ala Met Asp Val Asn Arg Glu Ser Cys Gln
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Ile Ser Gln Asn Leu Asp Ile Met Lys Glu Lys Glu Asn Lys Gly Phe
      225          230          235          240
Phe Ser Phe Phe Gln Arg Ser Lys Lys Lys Arg Asp Gln Thr Ala Ser
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      260          265          270
Ser Asn Thr Ile Ser Lys Pro Tyr Ile Ser Asn Thr Leu Pro Ser Asp
      275          280          285
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Ser Val Pro Gln Asp Leu Ala His Ile Gln Glu Arg Pro Ala Ser Cys
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Ile Val Lys Ser Met Ser Val Asp Glu Thr Asp Lys Ser Pro Cys Glu
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Ala Gly Arg Val Arg Ala Gly Ser Leu Gln Leu Ser Ser Met Ser Ala
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Ser Lys Ile Pro Pro His Gln Ser Asp Glu Asn Ser Arg Val Thr Ala

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Gln	Asp	Ile	Pro	Phe	Val	Ser	Thr	Asp	Ile	Ile	Asn	Thr	Leu	Lys	Asn	
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His	Ser	Val	Val	Tyr	Asp	Thr	Ser	Asn	Gly	Lys	Lys	Val	Val	Asp	Ser	
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Ile	Arg	Asn	Leu	Lys	Ser	Leu	Gly	Pro	Asn	Gln	Glu	Asn	Val	Gln	Asn	
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Glu	Ile	Ile	Val	Tyr	Pro	Glu	Asn	Thr	Glu	Asp	Asn	Met	Lys	Asn	Gly	
				565					570					575		
Val	Lys	Lys	Thr	Glu	Ile	Asn	Val	Glu	Gly	Val	Ala	Lys	Asn	Asn	Asn	
			580					585					590			
Ile	Asp	Met	Glu	Val	Glu	Arg	Pro	Ser	Asn	Ser	Glu	Ala	His	Glu	Thr	
	595						600					605				
Asp	Thr	Ala	Ile	Ser	Tyr	Lys	Glu	Asn	His	Leu	Ala	Ala	Ser	Ser	Val	
	610					615					620					
Pro	Asp	Gln	Lys	Leu	Asn	Gln	Pro	Ser	Ala	Glu	Lys	Thr	Lys	Asp	Ala	
625					630					635					640	
Ala	Ile	Gln	Thr	Thr	Pro	Ser	Cys	Asn	Ser	Phe	Asp	Gly	Lys	His	Gln	
				645					650					655		
Asp	His	Asn	Leu	Ser	Asp	Ser	Lys	Val	Glu	Glu	Cys	Val	Gln	Thr	Ser	
			660					665					670			
Asn	Asn	Asn	Ile	Ser	Thr	Gln	His	Ser	Cys	Leu	Ser	Ser	Gln	Asp	Ser	
		675					680						685			
Val	Asn	Thr	Ser	Arg	Glu	Phe	Arg	Ser	Gln	Gly	Thr	Leu	Ile	Ile	His	
	690					695					700					
Ser	Glu	Asp	Pro	Leu	Thr	Val	Lys	Asp	Pro	Ile	Cys	Ala	His	Gly	Asn	
705					710					715					720	
Asp	Asp	Leu	Leu	Pro	Pro	Val	Asp	Arg	Ile	Asp	Lys	Asn	Ser	Thr	Ala	
				725					730							

				805					810					815			
Gln	Thr	Glu	Asp	Ser	Ala	Ile	Ser	Glu	Ser	Pro	Glu	Glu	Pro	Leu	Pro		
			820					825					830				
Asn	Leu	Lys	Pro	Lys	Pro	Asn	Leu	Arg	Thr	Glu	His	Gln	Val	Pro	Ser		
		835					840					845					
Ser	Val	Ser	Ser	Pro	Asp	Asp	Ala	Met	Val	Ser	Pro	Leu	Lys	Pro	Ala		
		850				855				860							
Pro	Lys	Met	Thr	Arg	Asp	Thr	Gly	Thr	Ala	Pro	Phe	Ala	Pro	Asn	Leu		
865					870				875					880			
Glu	Glu	Ile	Asn	Asn	Ile	Leu	Glu	Ser	Lys	Phe	Lys	Ser	Arg	Ala	Ser		
			885					890					895				
Asn	Ala	Gln	Ala	Lys	Pro	Ser	Ser	Phe	Phe	Leu	Gln	Met	Gln	Lys	Arg		
		900					905					910					
Val	Ser	Gly	His	Tyr	Val	Thr	Ser	Ala	Ala	Ala	Lys	Ser	Val	His	Ala		
	915					920					925						
Ala	Pro	Asn	Pro	Ala	Pro	Lys	Glu	Leu	Thr	Asn	Lys	Glu	Ala	Glu	Arg		
930					935				940								
Asp	Met	Leu	Pro	Ser	Pro	Glu	Gln	Thr	Leu	Ser	Pro	Leu	Ser	Lys	Met		
945				950					955					960			
Pro	His	Ser	Val	Pro	Gln	Pro	Leu	Val	Glu	Lys	Thr	Asp	Asp	Asp	Val		
			965					970					975				
Ile	Gly	Gln	Ala	Pro	Ala	Glu	Ala	Ser	Pro	Pro	Pro	Ile	Ala	Pro	Lys		
		980				985					990						
Pro	Val	Thr	Ile	Pro	Ala	Ser	Gln	Val	Ser	Thr	Gln	Asn	Leu	Lys	Thr		
	995					1000					1005						
Leu	Lys	Thr	Phe	Gly	Ala	Pro	Arg	Pro	Tyr	Ser	Ser	Ser	Gly	Pro	Ser		
1010					1015				1020								
Pro	Phe	Ala	Leu	Ala	Val	Val	Lys	Arg	Ser	Gln	Ser	Phe	Ser	Lys	Glu		
1025				1030					1035					1040			
Arg	Thr	Glu	Ser	Pro	Ser	Ala	Ser	Ala	Leu	Val	Gln	Pro	Pro	Ala	Asn		
			1045					1050					1055				
Thr	Glu	Glu	Gly	Lys	Thr	His	Ser	Val	Asn	Lys	Phe	Val	Asp	Ile	Pro		
		1060					1065					1070					
Gln	Leu	Gly	Val	Ser	Asp	Lys	Glu	Asn	Asn	Ser	Ala	His	Asn	Glu	Gln		
	1075					1080					1085						
Asn	Ser	Gln	Ile	Pro	Thr	Pro	Thr	Asp	Gly	Pro	Ser	Phe	Thr	Val	Met		
1090					1095				1100								
Arg	Gln	Ser	Ser	Leu	Thr	Phe	Gln	Ser	Ser	Asp	Pro	Glu	Gln	Met	Arg		
1105				1110					1115					1120			
Gln	Ser	Leu	Leu	Thr	Ala	Ile	Arg	Ser	Gly	Glu	Ala	Ala	Ala	Lys	Leu		
			1125					1130					1135				
Lys	Arg	Val	Thr	Ile	Pro	Ser	Asn	Thr	Ile	Ser	Val	Asn	Gly	Arg	Ser		
		1140					1145				1150						
Arg	Leu	Ser	His	Ser	Met	Ser	Pro	Asp	Ala	Gln	Asp	Gly	His				
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<210> 2931

<211> 625

<212> DNA

<213> Homo sapiens

<400> 2931

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60

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 120
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 180
 gtgttttttag gttcactctg atgagttgcc atgaaatcaa accaatctaa actgtcatct
 240
 ctgttatttt tgtgctgagc tgaatgtttc ctacttggtg atctattagg ctccagatgc
 300
 ggtgggggat ctagaactgg gcttccctcg gggctgcctc caggagagaa gatatgtgtg
 360
 agccaggcca aaggagcaaa gtggacattg ggttgcttcc atcaccagga gagacaggtg
 420
 ttccatggag ggcagacaat gtggaaagta acaagaaaaa aaggctagca ctagattctg
 480
 aagcagcagt ctctgctgat aaaccagact cagtactgac tcatcatgtc cccaggaacc
 540
 tgcagaagct gtgcaaagag agggcccaga agttgtgcag aaatagcacc aggggtgcctg
 600
 cacagtgcac agtcccttca cgcgt
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<210> 2932

<211> 90

<212> PRT

<213> Homo sapiens

<400> 2932

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Ser	Pro	Gly	Glu	Thr	Gly	Val	Pro	Trp	Arg	Ala	Asp	Asn	Val	Glu	Ser
		20					25					30			
Asn	Lys	Lys	Lys	Arg	Leu	Ala	Leu	Asp	Ser	Glu	Ala	Ala	Val	Ser	Ala
		35					40					45			
Asp	Lys	Pro	Asp	Ser	Val	Leu	Thr	His	His	Val	Pro	Arg	Asn	Leu	Gln
		50				55				60					
Lys	Leu	Cys	Lys	Glu	Arg	Ala	Gln	Lys	Leu	Cys	Arg	Asn	Ser	Thr	Arg
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Val	Pro	Ala	Gln	Cys	Thr	Val	Pro	Ser	Arg						
				85				90							

<210> 2933

<211> 688

<212> DNA

<213> Homo sapiens

<400> 2933

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 120
 cgagaaaagtc aagaaacgac tagagaactt ctgaaagtta aagacagatt aattgaagta
 180
 gaaagaaata atgctacact gcaagcagag aagcaagcgt tgaaaactca actgaagcaa
 240

cttgagacac agaacaataa tttgcaggct cagattcttg cacttcagag gcagacagtg
 300
 tcattacaag aacagaatac cactcttcaa acacagaatg ccaagcttca ggttgaaaat
 360
 tccaccctta attcccaaag tacctcactc atgaaccaga atgcccaact cctaattccag
 420
 cagtcttctt tagaaaatga aaatgaatct gtaatcaaag agcgagaaga cctaaaatct
 480
 ctctatgatt ctctgatcaa agatcatgaa aagctggaac ttcttcatga acgtcaggct
 540
 tcagagtatg aatctcttat ctctaaacat ggaactctga agtctgcca caaaaatctt
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 gaggtggaac atagagacct tgaagaccgt tacaatcagt tattaaaaca gaaaggacag
 660
 ttggaagatt tggaaaaaat gctcaaag
 688

<210> 2934

<211> 229

<212> PRT

<213> Homo sapiens

<400> 2934

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Lys	Gln	Arg	Gln	Asp	Glu	Glu	Arg	Met	Val	Gln	Ser	Ser	Pro	Pro	Ile
			20					25					30		
Ser	Gly	Glu	Asp	Asn	Lys	Trp	Glu	Arg	Glu	Ser	Gln	Glu	Thr	Thr	Arg
		35					40					45			
Glu	Leu	Leu	Lys	Val	Lys	Asp	Arg	Leu	Ile	Glu	Val	Glu	Arg	Asn	Asn
	50					55					60				
Ala	Thr	Leu	Gln	Ala	Glu	Lys	Gln	Ala	Leu	Lys	Thr	Gln	Leu	Lys	Gln
65					70					75				80	
Leu	Glu	Thr	Gln	Asn	Asn	Asn	Leu	Gln	Ala	Gln	Ile	Leu	Ala	Leu	Gln
			85					90					95		
Arg	Gln	Thr	Val	Ser	Leu	Gln	Glu	Gln	Asn	Thr	Thr	Leu	Gln	Thr	Gln
			100					105					110		
Asn	Ala	Lys	Leu	Gln	Val	Glu	Asn	Ser	Thr	Leu	Asn	Ser	Gln	Ser	Thr
		115					120					125			
Ser	Leu	Met	Asn	Gln	Asn	Ala	Gln	Leu	Leu	Ile	Gln	Gln	Ser	Ser	Leu
		130				135					140				
Glu	Asn	Glu	Asn	Glu	Ser	Val	Ile	Lys	Glu	Arg	Glu	Asp	Leu	Lys	Ser
145					150					155				160	
Leu	Tyr	Asp	Ser	Leu	Ile	Lys	Asp	His	Glu	Lys	Leu	Glu	Leu	Leu	His
			165					170					175		
Glu	Arg	Gln	Ala	Ser	Glu	Tyr	Glu	Ser	Leu	Ile	Ser	Lys	His	Gly	Thr
			180					185					190		
Leu	Lys	Ser	Ala	His	Lys	Asn	Leu	Glu	Val	Glu	His	Arg	Asp	Leu	Glu
		195				200						205			
Asp	Arg	Tyr	Asn	Gln	Leu	Leu	Lys	Gln	Lys	Gly	Gln	Leu	Glu	Asp	Leu
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Glu	Lys	Met	Leu	Lys											
225															

<210> 2935
<211> 1200
<212> DNA
<213> Homo sapiens

<400> 2935
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120
aactctaaaa gataaagcaa gaaatgtcaa gtaggttttg cacattgggc tgctttaggg
180
tgtgccctct gattcttctg gtgtactcat gatactctcc cttggtgccc tccaggtga
240
cgcagctatt tacgttcaga gtgaaatggg ctgtgtggct gggattggga aaggccttgt
300
taaagctggg agaggtttgg tcatggtgac aggggacctg aaggcccagc tctcttccc
360
tcttgccaat acagggacaa gttaaagaag aagaagaaag taaaggtaaa gatggaaaag
420
aaatccacgc cctctagggg ctcatcatcc aagtcgtcct caaggcagct aagcgagagc
480
ttcaagagca aagagtttgt gtctagtgat gagagctctt cgggagagaa caagagcaaa
540
aagaagagga ggaggagcga ggactctgaa gaagaagaac tagccagtac tccccccagc
600
tcagaggact cagcgtcagg atccgatgag tagaaacgga ggaaggttct ctttgcgctt
660
gccttctcac acccccggga agtcagcagg gaaacgcaga gaactcctat gaaccaccaa
720
aaggctgtaa atgatgaaac atgcaaagct agccacataa catcaagtgt ctttcttca
780
gcctctctcg gtaaagcatc atctcgaaag ccatttggga tctttctctc aaatgttctg
840
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960
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1020
aggataggat ctatgaaaat aaaaagttcc tgggatattg atgggagagc tactaagaga
1080
aggaaaaaat caggggatct taaaaaagcc aaggtacagg tggaaaggat gagggaggtt
1140
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1200

<210> 2936
<211> 109
<212> PRT
<213> Homo sapiens

<400> 2936
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20	25	30	
Val Lys Val Lys Met Glu Lys Lys Ser Thr Pro Ser Arg Gly Ser Ser			
35	40	45	
Ser Lys Ser Ser Ser Arg Gln Leu Ser Glu Ser Phe Lys Ser Lys Glu			
50	55	60	
Phe Val Ser Ser Asp Glu Ser Ser Ser Gly Glu Asn Lys Ser Lys Lys			
65	70	75	80
Lys Arg Arg Arg Ser Glu Asp Ser Glu Glu Glu Glu Leu Ala Ser Thr			
85	90	95	
Pro Pro Ser Ser Glu Asp Ser Ala Ser Gly Ser Asp Glu			
100	105		

<210> 2937

<211> 749

<212> DNA

<213> Homo sapiens

<400> 2937

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120
ctctcaaatt ttgtcttctg tcaatacaca ttctgggacc agtgtgagtc tacggtggct
180
gccccggtgg tggaccccgga ggtgccttca ccacagtcca aggatgccca gtacacagtg
240
accttctccc actgtaagga ctatgtggtg aatgtaacag aagaatttct ggagttcatt
300
tcagatggag cactggccat tgaagtatgg ggccaccggt gtgctggaaa tggcagctcc
360
atctgggagg tcgattctct tcatgctaag acaagaacac tgcattgacag gtggaatgaa
420
gtaacgcgaa gaatagaaat gtggatctcc atattagaat tgaatgagtt aggagagtat
480
gctgcagtgg aacttcatca ggcaaaagat gtcaacacag gaggcattct tcaacttaga
540
caggggtcatt cccgtagagt acaagtcacg gtgaaacctg tgcagcattc agggacactg
600
ccacttatgg ttgaagccat cctgtcagta tccatcggct gtgtaactgc caggtccacc
660
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720
agttatcagg aagaagactt aaactgcag
749

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<210> 2938

<211> 249

<212> PRT

<213> Homo sapiens

<400> 2938

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20	25	30	
Glu Ala Thr Gly Leu Pro Leu Asn Leu Ser Asn Phe Val Phe Cys Gln			
35	40	45	
Tyr Thr Phe Trp Asp Gln Cys Glu Ser Thr Val Ala Ala Pro Val Val			
50	55	60	
Asp Pro Glu Val Pro Ser Pro Gln Ser Lys Asp Ala Gln Tyr Thr Val			
65	70	75	80
Thr Phe Ser His Cys Lys Asp Tyr Val Val Asn Val Thr Glu Glu Phe			
85	90	95	
Leu Glu Phe Ile Ser Asp Gly Ala Leu Ala Ile Glu Val Trp Gly His			
100	105	110	
Arg Cys Ala Gly Asn Gly Ser Ser Ile Trp Glu Val Asp Ser Leu His			
115	120	125	
Ala Lys Thr Arg Thr Leu His Asp Arg Trp Asn Glu Val Thr Arg Arg			
130	135	140	
Ile Glu Met Trp Ile Ser Ile Leu Glu Leu Asn Glu Leu Gly Glu Tyr			
145	150	155	160
Ala Ala Val Glu Leu His Gln Ala Lys Asp Val Asn Thr Gly Gly Ile			
165	170	175	
Phe Gln Leu Arg Gln Gly His Ser Arg Arg Val Gln Val Thr Val Lys			
180	185	190	
Pro Val Gln His Ser Gly Thr Leu Pro Leu Met Val Glu Ala Ile Leu			
195	200	205	
Ser Val Ser Ile Gly Cys Val Thr Ala Arg Ser Thr Lys Leu Gln Arg			
210	215	220	
Gly Leu Asp Ser Tyr Gln Arg Asp Asp Glu Asp Gly Asp Asp Met Asp			
225	230	235	240
Ser Tyr Gln Glu Glu Asp Leu Asn Cys			
245			

<210> 2939

<211> 2405

<212> DNA

<213> Homo sapiens

<400> 2939

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120
ccactgcac cagccaatag gagcccagcc accatggcgg agctgcagga ggtgcagatc
180
acagaggaga agccactgtt gccaggacag acgcctgagg cgccaagac tcaactctgtg
240
gagacacat acggctctgt cactttcact gtctatggca cccccaacc caaacgccca
300
gcgatcctta cctaccacga tgtgggactc aactataaat cttgcttcca gccactgttt
360
cagttcgagg acatgcagga aatcattcag aactttgtgc gggttcatgt ggatgccct
420
ggaatggaag agggagcccc tgtgttcct ttgggatatc agtaccatc tctggaccag
480

cttgcagaca tgatcccttg cgtcctgcag tacctaaatt tctctacaat aattggagtt
 540
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 600
 gaaggtcttg tctcatcaa cattgatccc aatgccaagg gttggatgga ttgggcagcc
 660
 cacaagctaa caggcctcac ctcttcatt ccggagatga tccttggaaca tcttttcagc
 720
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 780
 gcaccaacc tggataacat tgaattgtac tggaacagct acaacaaccg ccgagacctg
 840
 aactttgagc gtggaggtga tatcacctc aggtgtcctg tgatgctggt ggtaggagac
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 960
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 1680
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 1740
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 1860
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 1980
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 2040
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 2100

tgaaccaatg tcccttcagc acctcccagg ttagatatgg gggaggtgag ggctgggtcc
 2160
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<210> 2940

<211> 357

<212> PRT

<213> Homo sapiens

<400> 2940

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		20						25					30		
Tyr	Gly	Ser	Val	Thr	Phe	Thr	Val	Tyr	Gly	Thr	Pro	Lys	Pro	Lys	Arg
		35					40					45			
Pro	Ala	Ile	Leu	Thr	Tyr	His	Asp	Val	Gly	Leu	Asn	Tyr	Lys	Ser	Cys
	50					55				60					
Phe	Gln	Pro	Leu	Phe	Gln	Phe	Glu	Asp	Met	Gln	Glu	Ile	Ile	Gln	Asn
65					70					75					80
Phe	Val	Arg	Val	His	Val	Asp	Ala	Pro	Gly	Met	Glu	Glu	Gly	Ala	Pro
				85					90					95	
Val	Phe	Pro	Leu	Gly	Tyr	Gln	Tyr	Pro	Ser	Leu	Asp	Gln	Leu	Ala	Asp
			100					105					110		
Met	Ile	Pro	Cys	Val	Leu	Gln	Tyr	Leu	Asn	Phe	Ser	Thr	Ile	Ile	Gly
		115					120						125		
Val	Gly	Val	Gly	Ala	Gly	Ala	Tyr	Ile	Leu	Ala	Arg	Tyr	Ala	Leu	Asn
	130					135					140				
His	Pro	Asp	Thr	Val	Glu	Gly	Leu	Val	Leu	Ile	Asn	Ile	Asp	Pro	Asn
145					150					155					160
Ala	Lys	Gly	Trp	Met	Asp	Trp	Ala	Ala	His	Lys	Leu	Thr	Gly	Leu	Thr
				165					170					175	
Ser	Ser	Ile	Pro	Glu	Met	Ile	Leu	Gly	His	Leu	Phe	Ser	Gln	Glu	Glu
			180					185					190		
Leu	Ser	Gly	Asn	Ser	Glu	Leu	Ile	Gln	Lys	Tyr	Arg	Asn	Ile	Ile	Thr
		195					200					205			
His	Ala	Pro	Asn	Leu	Asp	Asn	Ile	Glu	Leu	Tyr	Trp	Asn	Ser	Tyr	Asn
	210					215					220				
Asn	Arg	Arg	Asp	Leu	Asn	Phe	Glu	Arg	Gly	Gly	Asp	Ile	Thr	Leu	Arg
225					230					235					240
Cys	Pro	Val	Met	Leu	Val	Val	Gly	Asp	Gln	Ala	Pro	His	Glu	Asp	Ala
				245					250					255	
Val	Val	Glu	Cys	Asn	Ser	Lys	Leu	Asp	Pro	Thr	Gln	Thr	Ser	Phe	Leu
		260						265					270		
Lys	Met	Ala	Asp	Ser	Gly	Gly	Gln	Pro	Gln	Leu	Thr	Gln	Pro	Gly	Lys

<400> 2942

Xaa Ala Leu Ser Ser Leu Arg Ala Leu Gly Ser Gln Asp Leu Pro Leu
 1 5 10 15
 Gly Gly Asn Ala Pro Cys Ile Leu Gln Leu Asp Leu Gln His Leu His
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 Gly Arg Gly His Asp His Leu Ala Gly Ala Ser Pro Thr Ala Arg Gln
 35 40 45
 His Leu Phe Lys Gln Gly Gln Leu Ser Ala Gln Gly Gly Ala Gln Pro
 50 55 60
 Ser Val Glu Ala Pro Ala Ala Pro Arg Pro Thr Ala Thr Gln Leu Thr
 65 70 75 80
 Arg Asp Leu Leu Arg Ser Arg Gly Ile Ala Gly Leu Tyr Lys Gly Leu
 85 90 95
 Gly Ala Thr Leu Leu Arg Asp Val Pro Phe Ser Val Val Tyr Phe Pro
 100 105 110
 Leu Phe Ala Asn Leu Asn Gln Leu Gly Arg Pro Ala Ser Glu Glu Lys
 115 120 125
 Ser Pro Phe Tyr Val Ser Phe Leu Ala Gly Cys Val Ala Gly Ser Ala
 130 135 140
 Ala Ala Val Ala Val Asn Pro Cys Asp Val Val Lys Thr Arg Leu Gln
 145 150 155 160
 Ser Leu Gln Arg Gly Val Asn Glu Asp Thr Tyr Ser Gly Ile Leu Asp
 165 170 175
 Cys Ala Arg Lys Ile Leu Arg His Glu Gly Pro Ser Ala Phe Leu Lys
 180 185 190
 Gly Ala Tyr Cys Arg Ala Leu Val Ile Ala Pro Leu Phe Gly Ile Ala
 195 200 205
 Gln Val Val Tyr Phe Leu Gly Ile Ala Glu Ser Leu Leu Gly Leu Leu
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 Gln Asp Pro Gln Ala
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<210> 2943

<211> 1501

<212> DNA

<213> Homo sapiens

<400> 2943

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 120
 tctagtgttt ggggtttcttc gcggctgctc aagatgaacc gactcttcgg gaaagcgaaa
 180
 cccaaggctc cgccgcccag cctgactgac tgcattggca cggtggacag tagagcagaa
 240
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 300
 aagaagatga gagaggggtcc tgcaaagaat atgggtcaagc agaaagcctt gcgagtttta
 360
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 420
 aacgccaatt ataccatcca gtctttgaag gacaccaaga ccacggttga tgctatgaaa
 480

ctgggagtaa aggaaatgaa gaaggcatat aagcaagtga agatcgacca gattgaggat
 540
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 720
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 780
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 840
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 900
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 960
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 1020
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 1080
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 1200
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 1320
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 1380
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 a
 1501

<210> 2944

<211> 218

<212> PRT

<213> Homo sapiens

<400> 2944

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Leu	Thr	Asp	Cys	Ile	Gly	Thr	Val	Asp	Ser	Arg	Ala	Glu	Ser	Ile	Asp
		20						25					30		
Lys	Lys	Ile	Ser	Arg	Leu	Asp	Ala	Glu	Leu	Val	Lys	Tyr	Lys	Asp	Gln
		35					40					45			
Ile	Lys	Lys	Met	Arg	Glu	Gly	Pro	Ala	Lys	Asn	Met	Val	Lys	Gln	Lys
	50					55				60					
Ala	Leu	Arg	Val	Leu	Lys	Gln	Lys	Arg	Met	Tyr	Glu	Gln	Gln	Arg	Asp
65					70					75				80	
Asn	Leu	Ala	Asn	Ser	His	Ser	Thr	Trp	Asn	Ala	Asn	Tyr	Thr	Ile	Gln

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1020
cctagaaccg gttgcaagtt caagttcttc tttagaagaa acccctactt cagaaacaag
1080
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1140
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1200
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1260
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1320
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1440
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1620
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1680
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1740
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1800
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1860
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1920
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1980
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2100
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2160
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2220
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2280
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2340
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2400
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2520

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 2580
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 2640
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 2700
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 2760
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 2820
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 2880
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 2940
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 3000
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 3180
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 3240
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 aatcattaa gttcttaatg gattaaaatc a
 3331

<210> 2946

<211> 463

<212> PRT

<213> Homo sapiens

<400> 2946

Xaa	Arg	Arg	Leu	Ala	Pro	Ser	Ser	Ala	Ser	Glu	Glu	Asn	Gly	Arg	Ser
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Pro	Ala	Val	Gly	Pro	Thr	Val	Ser	Asn	Met	Ser	Gly	Leu	Asp	Gly	Val
			20					25					30		
Lys	Arg	Thr	Thr	Pro	Leu	Gln	Thr	His	Ser	Ile	Ile	Ile	Ser	Asp	Gln
		35					40					45			
Val	Pro	Ser	Asp	Gln	Asp	Ala	His	Gln	Tyr	Leu	Arg	Leu	Arg	Asp	Gln
	50					55				60					
Ser	Glu	Ala	Thr	Gln	Val	Met	Ala	Glu	Pro	Gly	Glu	Gly	Gly	Ser	Glu
65					70					75				80	
Thr	Val	Ala	Leu	Pro	Pro	Pro	Pro	Pro	Ser	Glu	Glu	Gly	Gly	Val	Pro
			85						90					95	
Gln	Asp	Ala	Ala	Gly	Arg	Gly	Gly	Thr	Pro	Gln	Ile	Arg	Val	Val	Gly
		100						105					110		
Gly	Arg	Gly	His	Val	Ala	Ile	Lys	Ala	Gly	Gln	Glu	Glu	Gly	Gln	Pro
	115						120					125			
Pro	Ala	Glu	Gly	Leu	Ala	Ala	Ser	Val	Val	Met	Ala	Ala	Asp	Arg	
	130					135					140				
Ser	Leu	Lys	Lys	Gly	Val	Gln	Gly	Gly	Glu	Lys	Ala	Leu	Glu	Ile	Cys

145 150 155 160
 Gly Ala Gln Arg Ser Ala Ser Glu Leu Thr Ala Gly Ala Glu Ala Glu
 165 170 175
 Ala Glu Glu Val Lys Thr Gly Lys Cys Ala Thr Val Ser Ala Ala Val
 180 185 190
 Ala Glu Arg Glu Ser Ala Glu Val Val Val Lys Glu Gly Leu Ala Glu
 195 200 205
 Lys Glu Val Met Glu Glu Gln Met Glu Val Glu Glu Gln Pro Pro Glu
 210 215 220
 Gly Glu Glu Ile Glu Val Ala Glu Glu Asp Arg Leu Glu Glu Glu Ala
 225 230 235 240
 Arg Glu Glu Glu Gly Pro Trp Pro Leu His Glu Ala Leu Arg Met Asp
 245 250 255
 Pro Leu Glu Ala Ile Gln Leu Glu Leu Asp Thr Val Asn Ala Gln Ala
 260 265 270
 Asp Arg Ala Phe Gln Gln Leu Glu His Lys Phe Gly Arg Met Arg Arg
 275 280 285
 His Tyr Leu Glu Arg Arg Asn Tyr Ile Ile Gln Asn Ile Pro Gly Phe
 290 295 300
 Trp Met Thr Ala Phe Arg Asn His Pro Gln Leu Ser Ala Met Ile Arg
 305 310 315 320
 Gly Gln Asp Ala Glu Met Leu Arg Tyr Ile Thr Asn Leu Glu Val Lys
 325 330 335
 Glu Leu Arg His Pro Arg Thr Gly Cys Lys Phe Lys Phe Phe Phe Arg
 340 345 350
 Arg Asn Pro Tyr Phe Arg Asn Lys Leu Ile Val Lys Glu Tyr Glu Val
 355 360 365
 Arg Ser Ser Gly Arg Val Val Ser Leu Ser Thr Pro Ile Ile Trp Arg
 370 375 380
 Arg Gly His Glu Pro Gln Ser Phe Ile Arg Arg Asn Gln Asp Leu Ile
 385 390 395 400
 Cys Ser Phe Phe Thr Trp Phe Ser Asp His Ser Leu Pro Glu Ser Asp
 405 410 415
 Lys Ile Ala Glu Ile Ile Lys Glu Asp Leu Trp Pro Asn Pro Leu Gln
 420 425 430
 Tyr Tyr Leu Leu Arg Glu Gly Val Arg Arg Ala Arg Arg Arg Pro Leu
 435 440 445
 Arg Glu Pro Val Glu Ile Pro Arg Pro Phe Gly Phe Gln Ser Gly
 450 455 460

<210> 2947

<211> 997

<212> DNA

<213> Homo sapiens

<400> 2947

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 120
 ccttcattgca ggaaccacat caaatcaagc tgcagcttga tcgccttcaa ctccgaccgt
 180
 cctgggtgtac tgggcattgt gcctctgcaa ggccaaggag aggacaagcg acgcgtggcc
 240

cacctgggct gccattcaga cctagtcacc gacttggact tctcgccctt tgatgacttc
 300
 ctcttgccca caggctcggc tgacaggacg gtaaaactct ggcgactgcc agggcctggc
 360
 caggccctgc cctcagcacc cggggtgggtg ctgggccccg aggacctccc agtggaggta
 420
 ctgcagttcc accccacctc tgacggcatt ctggtgagcg cagcaggcac cactgtgaag
 480
 gtctgggacg cagccaagca gcagcccctg acagagctgg cagcccatgg ggacctgggtg
 540
 cagagcgccg tctggagccg agatggagcc ctggtgggca cggcgtgcaa ggacaagcag
 600
 ctgcagatct ttgaccccag aacaaagccg cgggcctctc agagcacgca ggcccatgag
 660
 aacagcaggg atagccggct ggcattggatg ggcacctggg agcaccttgt gtctactgga
 720
 ttcaaccaga tgcgtgagcg cgaagtgaag ctgtgggaca cgcggttctt ctccagcgcc
 780
 ctggcctccc tcaccttggg cacctcgctt ggggtgtctcg tgcctctgct ggacctgac
 840
 tctgggctcc tggctctggc aggaaagggc gagaggcagc tgtactgtta cgagggtggc
 900
 ccgcagcagc cggcgtgag cccagtgacc cagtgtgtcc tggagagcgt gctgcgtggg
 960
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 997

<210> 2948

<211> 332

<212> PRT

<213> Homo sapiens

<400> 2948

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Lys	Phe	Arg	His	Thr	Glu	Ala	Arg	Pro	Pro	Arg	Arg	Glu	Ser	Trp	Ile
			20					25					30		
Ser	Asp	Ile	Arg	Ala	Gly	Thr	Ala	Pro	Ser	Cys	Arg	Asn	His	Ile	Lys
		35					40					45			
Ser	Ser	Cys	Ser	Leu	Ile	Ala	Phe	Asn	Ser	Asp	Arg	Pro	Gly	Val	Leu
	50					55					60				
Gly	Ile	Val	Pro	Leu	Gln	Gly	Gln	Gly	Glu	Asp	Lys	Arg	Arg	Val	Ala
65					70					75				80	
His	Leu	Gly	Cys	His	Ser	Asp	Leu	Val	Thr	Asp	Leu	Asp	Phe	Ser	Pro
			85						90					95	
Phe	Asp	Asp	Phe	Leu	Leu	Ala	Thr	Gly	Ser	Ala	Asp	Arg	Thr	Val	Lys
			100					105					110		
Leu	Trp	Arg	Leu	Pro	Gly	Pro	Gly	Gln	Ala	Leu	Pro	Ser	Ala	Pro	Gly
		115					120					125			
Val	Val	Leu	Gly	Pro	Glu	Asp	Leu	Pro	Val	Glu	Val	Leu	Gln	Phe	His
	130					135					140				
Pro	Thr	Ser	Asp	Gly	Ile	Leu	Val	Ser	Ala	Ala	Gly	Thr	Thr	Val	Lys
145					150					155				160	
Val	Trp	Asp	Ala	Ala	Lys	Gln	Gln	Pro	Leu	Thr	Glu	Leu	Ala	Ala	His

<div> <div>165</div> <div>170</div> <div>175</div> </div>															
Gly	Asp	Leu	Val	Gln	Ser	Ala	Val	Trp	Ser	Arg	Asp	Gly	Ala	Leu	Val
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Gly	Thr	Ala	Cys	Lys	Asp	Lys	Gln	Leu	Gln	Ile	Phe	Asp	Pro	Arg	Thr
<div> <div>195</div> <div>200</div> <div>205</div> </div>															
Lys	Pro	Arg	Ala	Ser	Gln	Ser	Thr	Gln	Ala	His	Glu	Asn	Ser	Arg	Asp
<div> <div>210</div> <div>215</div> <div>220</div> </div>															
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Phe	Ser	Ser	Ala	Leu	Ala	Ser	Leu	Thr	Leu	Asp	Thr	Ser	Leu	Gly	Cys
<div> <div>260</div> <div>265</div> <div>270</div> </div>															
Leu	Val	Pro	Leu	Leu	Asp	Pro	Asp	Ser	Gly	Leu	Leu	Val	Leu	Ala	Gly
<div> <div>275</div> <div>280</div> <div>285</div> </div>															
Lys	Gly	Glu	Arg	Gln	Leu	Tyr	Cys	Tyr	Glu	Val	Val	Pro	Gln	Gln	Pro
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Ala	Leu	Ser	Pro	Val	Thr	Gln	Cys	Val	Leu	Glu	Ser	Val	Leu	Arg	Gly
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Ala	Ala	Leu	Val	Pro	Arg	Gln	Ala	Leu	Ala	Val	Met				
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<210> 2949

<211> 880

<212> DNA

<213> Homo sapiens

<400> 2949

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120	ggcactgtgt	ggctcttggtc	ataggtactt	tggattttcc	catttacttt
180	acaacagtct	tgtgattgaa	aatcttactc	caaattccac	cttccacatt
240	ccaaattcat	aaactgtggt	gggctttagg	ttttccacaa	ttgtttcagg
300	atttgaaaaa	tccacttctt	ttctttatcc	ttttctcgat	agcgaattgt
360	tcattgggac	agtgacttgg	caatgtccag	tcatgggtgtg	ggttgatgag
420	gacaggaaga	ctgagctcgg	tgtcagagtg	ccaaccacca	gctgcagagg
480	cgagttttac	ctgaacatga	cttcttttga	cttggagggtg	gagcagggtcg
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720	ttgaggtttg	gcctttttacc	ttttggcaat	ttctgtgcat	ttcccagggc
780					

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 880

<210> 2950
 <211> 279
 <212> PRT
 <213> Homo sapiens

<400> 2950
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 Lys Gly Lys Arg Pro Asn Leu Lys Val His Ile Asn Thr Thr Ser Asp
 35 40 45
 Ser Ile Leu Leu Lys Phe Leu Arg Pro Ser Pro Asn Val Lys Leu Glu
 50 55 60
 Gly Leu Leu Leu Gly Tyr Gly Ser Asn Val Ser Pro Asn Gln Tyr Phe
 65 70 75 80
 Pro Leu Pro Ala Glu Gly Lys Phe Thr Glu Ala Ile Val Asp Ala Glu
 85 90 95
 Pro Lys Tyr Leu Ile Val Val Arg Pro Ala Pro Pro Pro Ser Gln Lys
 100 105 110
 Lys Ser Cys Ser Gly Lys Thr Arg Ser Arg Lys Pro Leu Gln Leu Val
 115 120 125
 Val Gly Thr Leu Thr Pro Ser Ser Val Phe Leu Ser Trp Gly Phe Leu
 130 135 140
 Ile Asn Pro His His Asp Trp Thr Leu Pro Ser His Cys Pro Asn Asp
 145 150 155 160
 Arg Phe Tyr Thr Ile Arg Tyr Arg Glu Lys Asp Lys Glu Lys Lys Trp
 165 170 175
 Ile Phe Gln Ile Cys Pro Ala Pro Glu Thr Ile Val Glu Asn Leu Lys
 180 185 190
 Pro Asn Thr Val Tyr Glu Phe Gly Val Lys Asp Asn Val Glu Gly Gly
 195 200 205
 Ile Trp Ser Lys Ile Phe Asn His Lys Thr Val Val Gly Ser Lys Lys
 210 215 220
 Val Asn Gly Lys Ile Gln Ser Thr Tyr Asp Gln Asp His Thr Val Pro
 225 230 235 240
 Ala Tyr Val Pro Arg Lys Leu Ile Pro Ile Thr Ile Ile Lys Gln Val
 245 250 255
 Ile Gln Asn Val Thr His Lys Asp Ser Ala Lys Ser Pro Glu Lys Ala
 260 265 270
 Pro Leu Gly Gly Val Ile Leu
 275

<210> 2951
 <211> 3478
 <212> DNA
 <213> Homo sapiens

<400> 2951

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240
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300
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360
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420
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480
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600
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660
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720
agcgaggtga agctgctgcg caaggagagc cgcaacatga actcgcggtg cagcagctc
780
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<212> PRT

<213> Homo sapiens

<400> 2952

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<212> DNA

<213> Homo sapiens

<400> 2953

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<212> PRT

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<213> Homo sapiens

<400> 2958

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Lys	Ile	Asp	Ile	Ser	Ala	Val	Val	Ala	Tyr	Thr	Ile	Ala	Val	Lys	Glu
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<210> 2959

<211> 3323

<212> DNA

<213> Homo sapiens

<400> 2959

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<210> 2960

<211> 868

<212> PRT

<213> Homo sapiens

<400> 2960

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			20					25					30		
Gly	Glu	Glu	Gln	Ala	Gln	Tyr	Cys	Arg	Ala	Ala	Glu	Glu	Leu	Ser	Lys
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Leu	Arg	Arg	Ala	Ala	Val	Gly	Arg	Pro	Leu	Asp	Lys	His	Glu	Gly	Ala
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<210> 2961

<211> 434

<212> DNA

<213> Homo sapiens

<400> 2961

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<210> 2964
 <211> 115
 <212> PRT

<213> Homo sapiens

<400> 2964

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 Gly Gly Pro Gly Arg Val Trp Gly Thr Ser Leu His Val Val Gly Leu
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<210> 2965

<211> 3739

<212> DNA

<213> Homo sapiens

<400> 2965

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<210> 2966

<211> 386

<212> PRT

<213> Homo sapiens

<400> 2966

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<212> DNA

<213> Homo sapiens

<400> 2967

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<211> 126

<212> PRT

<213> Homo sapiens

<400> 2968

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Trp	Glu	Asp	Lys	Asp	Glu	Phe	Leu	Asp	Val	Ile	Tyr	Trp	Phe	Arg	Gln
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<210> 2969

<211> 667

<212> DNA

<213> Homo sapiens

<400> 2969

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<212> PRT

<213> Homo sapiens

<400> 2970

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Ser	Gln	Thr	Ile	Met	Ile	Ala	Trp	Gly	Ser	Pro	Ser	Asn	Arg	Asp	Phe
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<212> DNA

<213> Homo sapiens

<400> 2971

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<211> 632

<212> PRT

<213> Homo sapiens

<400> 2972

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Arg Glu Val Lys Ser Leu Lys Lys Leu Asn His Ala Asn Val Val Lys
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Leu Lys Glu Val Ile Arg Glu Asn Asp His Leu Tyr Phe Ile Phe Glu
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Tyr Met Lys Glu Asn Leu Tyr Gln Leu Ile Lys Glu Arg Asn Lys Leu
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Phe Pro Glu Ser Ala Ile Arg Asn Ile Met Tyr Gln Ile Leu Gln Gly
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Leu Ala Phe Ile His Lys His Gly Phe Phe His Arg Asp Leu Lys Pro
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Glu Asn Leu Leu Cys Met Gly Pro Glu Leu Val Lys Ile Ala Asp Phe
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Tyr Ser Ser Pro Ile Asp Val Trp Ala Val Gly Cys Ile Met Ala Glu
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Gln His Gln Ala Ser Gln Pro Pro Leu His Leu Thr Tyr Pro Tyr Lys
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Ala Glu Val Ser Arg Thr Asp His Pro Ser His Leu Gln Glu Asp Lys
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Pro Ser Pro Leu Leu Phe Pro Ser Leu His Asn Lys His Pro Gln Ser
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Lys Ile Thr Ala Gly Leu Glu His Lys Asn Gly Glu Ile Lys Pro Lys
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Lys	Lys	Glu	Ile	Gly	Ser	Ala	Met	Gln	Arg	Val	His	Leu	Ala	Pro	Ile				
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Pro	Gly	Arg	Pro	Phe	Phe	His	Thr	Gln	Pro	Arg	Ser	Thr	Pro	Gly	Leu				
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Ile	Pro	Arg	Pro	Pro	Ala	Ala	Gln	Pro	Val	His	Gly	Arg	Thr	Asp	Trp				
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<211> 858

<212> DNA

<213> Homo sapiens

<400> 2973

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<210> 2974

<211> 117

<212> PRT

<213> Homo sapiens

<400> 2974

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			20					25					30		
Pro	Ala	Val	Leu	Glu	Ser	Ala	Val	Val	Ser	Ser	Pro	Asp	Pro	Ile	Arg
			35					40				45			
Gly	Glu	Val	Val	Lys	Ala	Phe	Ile	Val	Leu	Thr	Pro	Ala	Tyr	Ser	Ser
			50				55				60				
His	Asp	Pro	Glu	Ala	Leu	Thr	Arg	Glu	Leu	Gln	Glu	His	Val	Lys	Arg
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Val	Thr	Ala	Pro	Tyr	Lys	Thr	Pro	Arg	Lys	Val	Ala	Phe	Val	Ser	Glu
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Leu	Pro	Lys	Thr	Val	Ser	Gly	Lys	Ile	Gln	Arg	Ser	Lys	Leu	Arg	Ser
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<210> 2975

<211> 1425

<212> DNA

<213> Homo sapiens

<400> 2975

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<210> 2976

<211> 328

<212> PRT

<213> Homo sapiens

<400> 2976

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		20						25					30		
Thr	Leu	Arg	Trp	Glu	Glu	Thr	Arg	Thr	Pro	Glu	Ser	Gln	Pro	Asp	Thr
		35				40						45			
Pro	Pro	Gly	Thr	Pro	Leu	Val	Ser	Gln	Asp	Glu	Lys	Arg	Asp	Ala	Glu
	50					55					60				
Leu	Pro	Lys	Lys	Arg	Met	Gly	Lys	Ser	Asn	Pro	Gly	Trp	Glu	Asn	Leu
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<210> 2977

<211> 1420

<212> DNA

<213> Homo sapiens

<400> 2977

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<210> 2978

<211> 369

<212> PRT

<213> Homo sapiens

<400> 2978

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Asp	Pro	Asp	Gly	Ser	Trp	Ala	Gln	Ile	Ala	Glu	Lys	Arg	Ala	Val	Leu
			35				40					45			
Ala	His	Val	Asp	Val	Gln	Thr	Leu	Ser	Ser	Gln	Leu	Ala	Val	Thr	Val
			50			55					60				
Gly	Pro	Gly	Glu	Arg	Arg	Ile	Gly	Pro	Gly	Glu	Pro	Leu	Glu	Leu	Leu
65				70						75				80	
Cys	Asn	Val	Ser	Gly	Ala	Leu	Pro	Pro	Ala	Gly	Arg	His	Ala	Ala	Tyr
				85					90					95	
Ser	Val	Gly	Trp	Glu	Met	Ala	Pro	Ala	Gly	Ala	Pro	Gly	Pro	Gly	Arg
			100					105					110		
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Glu Ala Ala Ser Ala Arg Ser Arg Pro Leu Pro Val His Val Arg Glu		
180	185	190
Glu Gly Val Val Leu Glu Ala Val Ala Trp Leu Ala Gly Gly Thr Val		
195	200	205
Tyr Arg Gly Glu Thr Ala Ser Leu Leu Cys Asn Ile Ser Val Arg Gly		
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260	265	270
Val Ser Val Glu Leu Val Gly Pro Arg Ser His Arg Leu Arg Leu His		
275	280	285
Ser Leu Gly Pro Glu Asp Glu Gly Val Tyr His Cys Ala Pro Ser Ala		
290	295	300
Trp Val Gln His Ala Asp Tyr Ser Trp Tyr Gln Ala Gly Ser Ala Arg		
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Ser Gly Pro Val Thr Val Tyr Pro Tyr Met His Ala Leu Asp Thr Leu		
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Phe Val Pro Leu Leu Val Gly Thr Gly Val Ala Leu Val Thr Gly Ala		
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<210> 2979

<211> 2191

<212> DNA

<213> Homo sapiens

<400> 2979

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1860
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1980
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2040

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<210> 2980
 <211> 140
 <212> PRT
 <213> Homo sapiens

<400> 2980
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 35 40 45
 Asn Ala Arg Arg Ala Arg Val Gly Arg Ala Glu Cys Leu Leu Ser Gly
 50 55 60
 Arg Pro Pro Thr Ala Val Leu Pro Arg Leu Val Glu Asn Leu Lys Ala
 65 70 75 80
 Arg Val Pro Val Pro Gly His Thr Glu Pro Leu Trp Ser Glu Gly Thr
 85 90 95
 Ala Pro Gly Gln Gly Leu Trp Ser His Ala Pro Ala Asp Gly Ser Leu
 100 105 110
 Met Asn Leu Ile Arg Thr Leu Val Gly Ala Val Val Phe Glu Leu Leu
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 Ser Met Cys Phe Gly Asp Gly Ala Gly Ala Ala Cys
 130 135 140

<210> 2981
 <211> 617
 <212> DNA
 <213> Homo sapiens

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 240
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 420
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<210> 2982

<211> 107

<212> PRT

<213> Homo sapiens

<400> 2982

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Ser	Phe	Ser	Ser	Ser	Ser	Gln	Ser	Ser	Ser	Ser	Thr	Asp	Ala	Xaa	Gln
			20					25					30		
His	Ser	Ser	Ser	Ser	Glu	Glu	Ser	Thr	Lys	Arg	Thr	Ser	His	Ser	Lys
			35				40					45			
Leu	Pro	Glu	Gln	Glu	Ala	Ala	Glu	Ala	Asp	Leu	Ser	Asn	Met	Glu	Arg
			50				55				60				
Val	Ser	Leu	Ser	Thr	Ala	Asp	Pro	Gln	Gly	Val	Thr	Tyr	Ala	Glu	Leu
65					70					75					80
Ser	Thr	Ser	Ala	Leu	Ser	Glu	Ala	Ala	Ser	Asp	Thr	Thr	Gln	Glu	Pro
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<210> 2983

<211> 614

<212> DNA

<213> Homo sapiens

<400> 2983

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 480
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614

<210> 2984
<211> 204
<212> PRT
<213> Homo sapiens

<400> 2984
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35 40 45
Lys Arg Phe Ile Gly Asp Tyr Glu Pro Asn Thr Gly Lys Leu Tyr Ser
50 55 60
Arg Leu Val Tyr Val Glu Gly Asp Gln Leu Ser Leu Gln Ile Gln Asp
65 70 75 80
Thr Pro Gly Gly Val Gln Ile Gln Asp Ser Leu Pro Gln Val Val Asp
85 90 95
Ser Leu Gln Met Arg Ala Val Ala Glu Gly Phe Leu Leu Val Tyr Ser
100 105 110
Ile Thr Asp Tyr Asp Ser Tyr Leu Ser Ile Arg Pro Leu Tyr Gln His
115 120 125
Ile Arg Lys Val His Pro Asp Ser Lys Ala Pro Val Ile Ile Val Gly
130 135 140
Asn Lys Gly Asp Leu Leu His Ala Arg Gln Val Gln Thr Gln Asp Gly
145 150 155 160
Ile Gln Leu Ala Asn Glu Leu Gly Ser Leu Phe Leu Glu Ile Ser Thr
165 170 175
Ser Glu Asn Tyr Glu Asp Val Cys Asp Val Phe Gln His Leu Cys Lys
180 185 190
Glu Val Ser Lys Met His Gly Leu Ser Gly Glu Arg
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<210> 2985
<211> 4547
<212> DNA
<213> Homo sapiens

<400> 2985
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300
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360

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<210> 2986

<211> 988

<212> PRT

<213> Homo sapiens

<400> 2986

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		20						25					30		
Glu	Leu	Cys	Val	Lys	Leu	Met	Phe	Leu	His	Pro	Val	Asp	Tyr	Gly	Arg
		35					40					45			
Lys	Ala	Glu	Glu	Leu	Leu	Trp	Arg	Lys	Val	Tyr	Tyr	Glu	Val	Ile	Gln
	50					55					60				
Leu	Ile	Lys	Thr	Asn	Lys	Lys	His	Ile	His	Ser	Arg	Ser	Thr	Leu	Glu
65				70						75				80	
Cys	Ala	Tyr	Arg	Thr	His	Leu	Val	Ala	Gly	Ile	Gly	Phe	Tyr	Gln	His
				85					90					95	
Leu	Leu	Leu	Tyr	Ile	Gln	Ser	His	Tyr	Gln	Leu	Glu	Leu	Gln	Cys	Cys
		100						105					110		
Ile	Asp	Trp	Thr	His	Val	Thr	Asp	Pro	Leu	Ile	Gly	Cys	Lys	Lys	Pro

		115					120					125				
Val	Ser	Ala	Ser	Gly	Lys	Glu	Met	Asp	Trp	Ala	Gln	Met	Ala	Cys	His	
	130					135					140					
Arg	Cys	Leu	Val	Tyr	Leu	Gly	Asp	Leu	Ser	Arg	Tyr	Gln	Asn	Glu	Leu	
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Ala	Gly	Val	Asp	Thr	Glu	Leu	Leu	Ala	Glu	Arg	Phe	Tyr	Tyr	Gln	Ala	
				165					170					175		
Leu	Ser	Val	Ala	Pro	Gln	Ile	Gly	Met	Pro	Phe	Asn	Gln	Leu	Gly	Thr	
			180				185						190			
Leu	Ala	Gly	Ser	Lys	Tyr	Tyr	Asn	Val	Glu	Ala	Met	Tyr	Cys	Tyr	Leu	
	195					200					205					
Arg	Cys	Ile	Gln	Ser	Glu	Val	Ser	Phe	Glu	Gly	Ala	Tyr	Gly	Asn	Leu	
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Lys	Arg	Leu	Tyr	Asp	Lys	Ala	Ala	Lys	Met	Tyr	His	Gln	Leu	Lys	Lys	
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Cys	Glu	Thr	Arg	Lys	Leu	Ser	Pro	Gly	Lys	Lys	Arg	Cys	Lys	Asp	Ile	
				245					250					255		
Lys	Arg	Leu	Leu	Val	Asn	Phe	Met	Tyr	Leu	Gln	Ser	Leu	Leu	Gln	Pro	
		260					265						270			
Lys	Ser	Ser	Ser	Val	Asp	Ser	Glu	Leu	Thr	Ser	Leu	Cys	Gln	Ser	Val	
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Leu	Glu	Asp	Phe	Asn	Leu	Cys	Leu	Phe	Tyr	Leu	Pro	Ser	Ser	Pro	Asn	
	290					295				300						
Leu	Ser	Leu	Ala	Ser	Glu	Asp	Glu	Glu	Glu	Tyr	Glu	Ser	Gly	Tyr	Ala	
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Phe	Leu	Pro	Asp	Leu	Leu	Ile	Phe	Gln	Met	Val	Ile	Ile	Cys	Leu	Met	
				325					330					335		
Cys	Val	His	Ser	Leu	Glu	Arg	Ala	Gly	Ser	Lys	Gln	Tyr	Ser	Ala	Ala	
			340					345					350			
Ile	Ala	Phe	Thr	Leu	Ala	Leu	Phe	Ser	His	Leu	Val	Asn	His	Val	Asn	
	355						360					365				
Ile	Arg	Leu	Gln	Ala	Glu	Leu	Glu	Glu	Gly	Glu	Asn	Pro	Val	Pro	Ala	
	370					375				380						
Phe	Gln	Ser	Asp	Gly	Thr	Asp	Glu	Pro	Glu	Ser	Lys	Glu	Pro	Val	Glu	
385					390					395				400		
Lys	Glu	Glu	Glu	Pro	Asp	Pro	Glu	Pro	Pro	Pro	Val	Thr	Pro	Gln	Val	
				405					410					415		
Gly	Glu	Gly	Arg	Lys	Ser	Arg	Lys	Phe	Ser	Arg	Leu	Ser	Cys	Leu	Arg	
			420					425					430			
Arg	Arg	Arg	His	Pro	Pro	Lys	Val	Gly	Asp	Asp	Ser	Asp	Leu	Ser	Glu	
	435						440					445				
Gly	Phe	Glu	Ser	Asp	Ser	Ser	His	Asp	Ser	Ala	Arg	Ala	Ser	Glu	Gly	
	450					455					460					
Ser	Asp	Ser	Gly	Ser	Asp	Lys	Ser	Leu	Glu	Gly	Gly	Gly	Thr	Ala	Phe	
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545					550					555				560
Asn	Leu	Leu	Leu	Gln	Pro	Thr	Thr	Asn	Pro	His	Thr	Ser	Ala	Ser
				565					570					575
Arg	Pro	Cys	Val	Asn	Gly	Asp	Val	Asp	Lys	Pro	Ser	Glu	Pro	Ala
			580					585					590	
Glu	Glu	Gly	Ser	Glu	Ser	Glu	Gly	Ser	Glu	Ser	Ser	Gly	Arg	Ser
		595				600						605		Cys
Arg	Asn	Glu	Arg	Ser	Ile	Gln	Glu	Lys	Leu	Gln	Val	Leu	Met	Ala
	610					615					620			Glu
Gly	Leu	Leu	Pro	Ala	Val	Lys	Val	Phe	Leu	Asp	Trp	Leu	Arg	Thr
	625				630					635				640
Pro	Asp	Leu	Ile	Ile	Val	Cys	Ala	Gln	Ser	Ser	Gln	Ser	Leu	Trp
			645						650					655
Arg	Leu	Ser	Val	Leu	Leu	Asn	Leu	Leu	Pro	Ala	Ala	Gly	Glu	Leu
		660						665					670	Gln
Glu	Ser	Gly	Leu	Ala	Leu	Cys	Pro	Glu	Val	Gln	Asp	Leu	Leu	Glu
		675					680					685		Gly
Cys	Glu	Leu	Pro	Asp	Leu	Pro	Ser	Ser	Leu	Leu	Leu	Pro	Glu	Asp
	690					695					700			Met
Ala	Leu	Arg	Asn	Leu	Pro	Pro	Leu	Arg	Ala	Ala	His	Arg	Arg	Phe
	705				710					715				Asn
Phe	Asp	Thr	Asp	Arg	Pro	Leu	Leu	Ser	Thr	Leu	Glu	Glu	Ser	Val
			725						730					735
Arg	Ile	Cys	Cys	Ile	Arg	Ser	Phe	Gly	His	Phe	Ile	Ala	Arg	Leu
		740						745					750	Gln
Gly	Ser	Ile	Leu	Gln	Phe	Asn	Pro	Glu	Val	Gly	Ile	Phe	Val	Ser
		755					760					765		Ile
Ala	Gln	Ser	Glu	Gln	Glu	Ser	Leu	Leu	Gln	Gln	Ala	Gln	Ala	Gln
	770					775					780			Phe
Arg	Met	Ala	Gln	Glu	Glu	Ala	Arg	Arg	Asn	Arg	Leu	Met	Arg	Asp
	785					790				795				Met
Ala	Gln	Leu	Arg	Leu	Gln	Leu	Glu	Val	Ser	Gln	Leu	Glu	Gly	Ser
			805						810					Leu
Gln	Gln	Pro	Lys	Ala	Gln	Ser	Ala	Met	Ser	Pro	Tyr	Leu	Val	Pro
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Thr	Gln	Ala	Leu	Cys	His	His	Leu	Pro	Val	Ile	Arg	Gln	Leu	Ala
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Ser	Gly	Arg	Phe	Ile	Val	Ile	Ile	Pro	Arg	Thr	Val	Ile	Asp	Gly
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Asp	Leu	Leu	Lys	Lys	Glu	His	Pro	Gly	Ala	Arg	Asp	Gly	Ile	Arg
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Leu	Glu	Ala	Glu	Phe	Lys	Lys	Gly	Asn	Arg	Tyr	Ile	Arg	Cys	Gln
			885					890						Lys
Glu	Val	Gly	Lys	Ser	Phe	Glu	Arg	His	Lys	Leu	Lys	Arg	Gln	Asp
		900						905					910	Ala
Asp	Ala	Trp	Thr	Leu	Tyr	Lys	Ile	Leu	Asp	Ser	Cys	Lys	Gln	Leu
	915						920						925	Thr
Leu	Ala	Gln	Gly	Ala	Gly	Glu	Glu	Asp	Pro	Ser	Gly	Met	Val	Thr
	930					935					940			Ile
Ile	Thr	Gly	Leu	Pro	Leu	Asp	Asn	Pro	Ser	Val	Leu	Ser	Gly	Pro
	945				950					955				Met
Gln	Ala	Ala	Leu	Gln	Ala	Ala	Ala	His	Ala	Ser	Val	Asp	Ile	Lys
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980

985

<210> 2987
 <211> 1016
 <212> DNA
 <213> Homo sapiens

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<210> 2988
 <211> 95
 <212> PRT
 <213> Homo sapiens

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 Ala Ser Arg Val Ala Gly Thr Thr Gly Thr Arg His Asn Ala Arg Leu

			35					40						45		
Phe	Phe	Val	Phe	Leu	Val	Glu	Met	Gly	Phe	His	Tyr	Val	Ser	Gln	Asp	
	50					55					60					
Gly	Leu	Asp	Leu	Leu	Thr	Ser	Leu	Leu	Ala	Xaa	Leu	Arg	Leu	Pro	Lys	
65					70					75					80	
Cys	Trp	Asn	Tyr	Xaa	Arg	Glu	Thr	Pro	Arg	Leu	Val	Ser	Ile	Lys		
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<212> DNA
<213> Homo sapiens
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1185

<210> 2990
 <211> 114
 <212> PRT
 <213> Homo sapiens

<400> 2990
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 35 40 45
 Asp Val Met Leu Glu Thr Tyr Ser Ser Leu Val Ser Leu Gly His Cys
 50 55 60
 Ile Thr Lys Pro Glu Met Ile Phe Lys Leu Glu Gln Gly Ala Glu Pro
 65 70 75 80
 Trp Ile Val Glu Glu Thr Leu Asn Leu Arg Leu Ser Gly Gly Ser Lys
 85 90 95
 Lys Gln Val Phe Ser Gly Ile Cys His Arg Ser Leu Val Glu Leu Gln
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 Glu Val

<210> 2991
 <211> 980
 <212> DNA
 <213> Homo sapiens

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cccacagaat ccaatggagc accgtgggtt gtttccattg ggacatcaaa gtttagctgac
 780
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<210> 2992

<211> 64

<212> PRT

<213> Homo sapiens

<400> 2992

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His	Thr	Gly	Pro	Phe	Thr	Glu	Val	Ser	Pro	Gly	Ala	Leu	Gly	Trp	Pro
			20					25					30		
Val	Leu	Cys	Ser	Gly	Leu	Leu	Leu	Gly	Gly	Leu	Gly	Ala	Ala	His	Phe
		35					40				45				
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<210> 2993

<211> 687

<212> DNA

<213> Homo sapiens

<400> 2993

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 420
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<210> 2994
<211> 229
<212> PRT
<213> Homo sapiens

<400> 2994
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Ala Val Ala Thr Ser Pro Asp Gly Arg Tyr Leu Lys Phe Asp Ile Glu
35 40 45
Ile Gly Arg Gly Ser Phe Lys Thr Val Tyr Arg Gly Leu Asp Thr Asp
50 55 60
Thr Thr Val Glu Val Ala Trp Cys Glu Leu Gln Thr Arg Lys Leu Ser
65 70 75 80
Arg Ala Glu Arg Gln Arg Phe Ser Glu Glu Val Glu Met Leu Lys Gly
85 90 95
Leu Gln His Pro Asn Ile Val Arg Phe Tyr Asp Ser Trp Lys Ser Val
100 105 110
Leu Arg Gly Gln Val Cys Ile Val Leu Val Thr Glu Leu Met Thr Ser
115 120 125
Gly Thr Leu Lys Thr Tyr Leu Arg Arg Phe Arg Glu Met Lys Pro Arg
130 135 140
Val Leu Gln Arg Trp Ser Arg Gln Ile Leu Arg Gly Leu His Phe Leu
145 150 155 160
His Ser Arg Val Pro Pro Ile Leu His Arg Asp Leu Lys Cys Asp Asn
165 170 175
Val Phe Ile Thr Gly Pro Thr Gly Ser Val Lys Ile Gly Asp Leu Gly
180 185 190
Leu Ala Thr Leu Lys Arg Ala Ser Phe Ala Lys Ser Val Ile Gly Thr
195 200 205
Pro Glu Phe Met Ala Pro Glu Met Tyr Glu Glu Lys Tyr Asp Glu Ala
210 215 220
Val Asp Val Tyr Ala
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<210> 2995
<211> 1879
<212> DNA
<213> Homo sapiens

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1860

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1879

<210> 2996
<211> 101
<212> PRT
<213> Homo sapiens

<400> 2996
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20 25 30
Leu Xaa Thr Gln Ala Gly Ile Gln Trp Cys Asp Leu Ser Ser Leu Gln
35 40 45
Pro Pro Pro Pro Arg Phe Lys Arg Phe Ser Cys Leu Ser Leu Leu Ser
50 55 60
Ser Trp Asp Ser Asp Arg Cys Leu Pro Pro His Pro Gly Asp Phe Cys
65 70 75 80
Ile Phe Ser Arg Asp Gly Val Ser Pro Cys Cys Ser Gly Trp Ser Arg
85 90 95
Thr Pro Asp Leu Lys
100

<210> 2997
<211> 800
<212> DNA
<213> Homo sapiens

<400> 2997
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<210> 2998
 <211> 266
 <212> PRT
 <213> Homo sapiens

<400> 2998
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 Ser Thr Ile Lys Asp Ile Val Ser Thr Thr Ile Pro Ala Ser Ser Glu
 35 40 45
 Ile Thr Arg Ile Glu Met Glu Ser Thr Ser Thr Leu Thr Pro Thr Pro
 50 55 60
 Arg Glu Thr Ser Thr Ser Gln Glu Ile His Ser Ala Thr Lys Pro Ser
 65 70 75 80
 Thr Val Pro Tyr Lys Ala Leu Thr Ser Ala Thr Ile Glu Asp Ser Met
 85 90 95
 Thr Gln Val Met Ser Ser Ser Arg Gly Pro Ser Pro Asp Gln Ser Thr
 100 105 110
 Met Ser Gln Asp Ile Ser Thr Glu Val Ile Thr Arg Leu Ser Thr Ser
 115 120 125
 Pro Ile Lys Thr Glu Ser Thr Glu Met Thr Ile Thr Thr Gln Thr Gly
 130 135 140
 Ser Pro Gly Ala Thr Ser Arg Gly Thr Leu Thr Leu Asp Thr Ser Thr
 145 150 155 160
 Thr Phe Met Ser Gly Thr His Ser Thr Ala Ser Gln Arg Phe Ser His
 165 170 175
 Ser Gln Met Thr Ala Leu Met Ser Arg Thr Pro Gly Asp Val Pro Trp
 180 185 190
 Leu Thr His Pro Ser Gly Glu Glu Pro Ala Ser Ala Ser Phe Ser Leu
 195 200 205
 Ala Ser Pro Val Leu Thr Ser Phe Phe Ser Phe Phe Ala His Ser Gln
 210 215 220
 Lys Pro Pro Pro Phe Leu Val Pro Gly Gln Thr Phe Ser Leu Gly Leu
 225 230 235 240
 Gly Lys Pro Lys Met Trp Gly Gln Pro Arg Thr Glu Thr Phe Pro Pro
 245 250 255
 Met Asp Asn Leu Phe Glu Lys Gly Pro Phe
 260 265

<210> 2999
 <211> 550
 <212> DNA
 <213> Homo sapiens

<400> 2999
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 420
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<210> 3000

<211> 167

<212> PRT

<213> Homo sapiens

<400> 3000

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Val	Gln	Leu	Val	Val	Leu	Ile	Ser	Ala	Gln	Leu	Trp	Leu	Ser	Pro	Gly
			20					25					30		
Ala	Phe	Met	Gly	Leu	Arg	Gly	Glu	Lys	Val	His	Ala	Asn	Ser	Ser	Met
		35					40					45			
Gly	Gly	His	Gly	Trp	Ala	Gln	Gly	Lys	Ala	Pro	Gln	Val	Ala	Leu	Ala
	50					55				60					
Val	Ser	Gly	Thr	Gly	Asp	Pro	Ser	Pro	Arg	Leu	Gln	Ala	Phe	Pro	Gly
65					70				75					80	
Leu	Glu	Val	Gly	Leu	His	Cys	Gly	Pro	Ala	Ser	Phe	His	Pro	Gly	Ala
				85					90					95	
Cys	Leu	Pro	Pro	Ala	Ala	Val	His	Gly	Asp	Gln	Ala	Val	His	Val	Lys
			100					105					110		
Gly	Cys	Leu	Gln	Ala	Ser	Thr	Gly	Leu	Ser	Ser	Val	His	Pro	Ser	Ala
		115					120					125			
Ser	Phe	Pro	Cys	Leu	Ser	Val	Pro	Lys	Ala	Trp	Arg	Gly	Pro	Lys	Trp
	130					135				140					
Gln	Gly	Gly	Trp	His	Val	Ser	Thr	Thr	Pro	Ser	Met	Cys	Thr	Leu	Ser
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				165											

<210> 3001

<211> 1092

<212> DNA

<213> Homo sapiens

<400> 3001

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<210> 3002

<211> 115

<212> PRT

<213> Homo sapiens

<400> 3002

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Trp	Leu	Ser	Leu	Lys	Gly	His	Cys	Ser	Val	Ser	Ala	Leu	Arg	Cys	Leu
			20					25					30		
Glu	Val	Gln	Arg	Leu	Ser	Pro	Tyr	Val	Cys	Leu	Gly	Glu	Ser	Gln	Lys
		35					40					45			
Val	Glu	Ser	Gln	Pro	Cys	Ser	Ala	His	Gln	Cys	Phe	Phe	Tyr	Asn	Pro
	50					55					60				
Asp	Ile	Ala	Lys	Thr	Ala	Val	Pro	Thr	Glu	Ala	Ser	Ser	Pro	Ala	Gln

65		70		75		80									
Ala	Leu	Pro	Pro	Xaa	Ser	Thr	Lys	Ala	Ser	Leu	Ser	Gly	Lys	Gly	Tyr
			85					90						95	
Arg	Thr	Gln	Cys	Ser	His	Gln	Thr	Ala	Ala	Trp	Gly	Thr	Pro	Ser	Thr
		100						105					110		
Glu	Arg	Ser													
		115													

<210> 3003
 <211> 474
 <212> DNA
 <213> Homo sapiens

<400> 3003
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 ccaacaggag gaccggaaga gactggcgga gctgctggtc tccgtcctgg aacagggctt
 180
 gccaccctcc caccgtgtca tctgggtgca gagtgtccga atcctgtccc gggaccgcaa
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 ctgcctggac ccgttcacca gccgccagag cctgcaggca ctagcctgct atgctgacat
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 ctctgtctct gaggggtccg tcccagagtc cgcagacatg gatgttgtag tggagtcctt
 360
 caagtgcctg tgcaacctcg tgctcagcag ccctgtggca cagatgctgg cagcagaggg
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 474

<210> 3004
 <211> 155
 <212> PRT
 <213> Homo sapiens

<400> 3004
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 20 25 30
 Phe Thr Phe Asp Asp Ala Gln Gln Glu Asp Arg Lys Arg Leu Ala Glu
 35 40 45
 Leu Leu Val Ser Val Leu Glu Gln Gly Leu Pro Pro Ser His Arg Val
 50 55 60
 Ile Trp Leu Gln Ser Val Arg Ile Leu Ser Arg Asp Arg Asn Cys Leu
 65 70 75 80
 Asp Pro Phe Thr Ser Arg Gln Ser Leu Gln Ala Leu Ala Cys Tyr Ala
 85 90 95
 Asp Ile Ser Val Ser Glu Gly Ser Val Pro Glu Ser Ala Asp Met Asp
 100 105 110
 Val Val Leu Glu Ser Leu Lys Cys Leu Cys Asn Leu Val Leu Ser Ser
 115 120 125
 Pro Val Ala Gln Met Leu Ala Ala Glu Ala Arg Leu Val Val Lys Leu

130	135	140
Thr Glu Arg Val Gly Leu Tyr Arg Glu Arg Ser		
145	150	155

<210> 3005
 <211> 799
 <212> DNA
 <213> Homo sapiens

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 180
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 240
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 360
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 480
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<210> 3006
 <211> 266
 <212> PRT
 <213> Homo sapiens

<400> 3006
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 Asp Gln Tyr Val Asn Lys Arg Tyr Pro Gly Leu Val Lys Ile Val Arg
 35 40 45
 Asn Ser Arg Arg Glu Gly Leu Ile Arg Ala Arg Leu Gln Gly Trp Lys
 50 55 60
 Ala Ala Thr Ala Pro Val Val Gly Phe Phe Asp Ala His Val Glu Phe

65		70		75		80
Asn Thr Gly Trp	Ala Glu Pro Ala Leu Ser Arg Ile Arg Glu Asp Arg					
	85		90		95	
Arg Arg Ile Val	Leu Pro Ala Ile Asp Asn Ile Lys Tyr Ser Thr Phe					
	100		105		110	
Glu Val Gln Gln Tyr	Ala Asn Ala Ala His Gly Tyr Asn Trp Gly Leu					
	115		120		125	
Trp Cys Met Tyr Ile	Ile Pro Pro Gln Asp Trp Leu Asp Arg Gly Asp					
	130		135		140	
Glu Ser Ala Pro Ile	Arg Thr Pro Ala Met Ile Gly Cys Ser Phe Val					
145		150		155		160
Val Asp Arg Glu Tyr	Phe Gly Asp Ile Gly Leu Leu Asp Pro Gly Met					
	165		170		175	
Glu Val Tyr Gly Gly	Glu Asn Val Glu Leu Gly Met Arg Val Trp Gln					
	180		185		190	
Cys Gly Gly Ser Met	Glu Val Leu Pro Cys Ser Arg Val Ala His Ile					
	195		200		205	
Glu Arg Thr Arg Lys	Pro Tyr Asn Asn Asp Ile Asp Tyr Tyr Ala Lys					
	210		215		220	
Arg Asn Ala Leu Arg	Thr Ala Glu Val Trp Met Asp Asp Phe Lys Ser					
225		230		235		240
His Val Tyr Met Ala	Trp Asn Ile Pro Met Ser Asn Pro Gly Val Asp					
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Phe Gly Asp Val Ser	Glu Arg Leu Ala Leu					
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<210> 3007

<211> 536

<212> DNA

<213> Homo sapiens

<400> 3007

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 120
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 180
 gctttgcatt atgctgctta ttttgatgtc cctgaactta taagagtgat tttgaaaaca
 240
 tcgaaaccaa aagatgtgga tgccccttgc agtgatttta attttggaac agctttgcat
 300
 attgcagcat acaacttgtg tgcaggtgct gtgaagtgcc tcttgaggca gggagcaaat
 360
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 420
 atgccgtag agatggctga cgccgcagcc actgctaagg aaatcaagca gatgcttcta
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<210> 3008

<211> 163

<212> PRT

<213> Homo sapiens

<400> 3008

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      20           25           30
Ala Asp Ile Ser Leu Arg Ser Arg Trp Thr Asn Met Asn Ala Leu His
      35           40           45
Tyr Ala Ala Tyr Phe Asp Val Pro Glu Leu Ile Arg Val Ile Leu Lys
      50           55           60
Thr Ser Lys Pro Lys Asp Val Asp Ala Pro Cys Ser Asp Phe Asn Phe
65           70           75           80
Gly Thr Ala Leu His Ile Ala Ala Tyr Asn Leu Cys Ala Gly Ala Val
      85           90           95
Lys Cys Leu Leu Glu Gln Gly Ala Asn Pro Ala Phe Arg Asn Asp Lys
      100          105          110
Gly Gln Ile Pro Ala Asp Val Val Pro Asp Pro Val Asp Met Pro Leu
      115          120          125
Glu Met Ala Asp Ala Ala Ala Thr Ala Lys Glu Ile Lys Gln Met Leu
      130          135          140
Leu Asp Ala Val Pro Leu Ser Cys Asn Ile Ser Lys Ala Met Leu Pro
145          150          155          160
Pro Ser Arg

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<210> 3009

<211> 1335

<212> DNA

<213> Homo sapiens

<400> 3009

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660

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<210> 3010

<211> 310

<212> PRT

<213> Homo sapiens

<400> 3010

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		20						25					30		
Ser	Gln	Val	Gly	Arg	Val	Trp	Pro	Ser	Ser	Tyr	Arg	Ala	Leu	Ile	Ser
		35					40					45			
Ala	Phe	Ser	Arg	Leu	Thr	Arg	Leu	Asp	Asp	Phe	Thr	Cys	Lys	Lys	Ile
	50					55					60				
Gly	Ser	Gly	Phe	Phe	Ser	Glu	Val	Phe	Lys	Val	Arg	His	Arg	Ala	Ser
65					70				75					80	
Gly	Gln	Val	Met	Ala	Leu	Lys	Met	Asn	Thr	Leu	Ser	Ser	Asn	Arg	Ala
			85					90					95		
Asn	Met	Leu	Lys	Glu	Val	Gln	Leu	Met	Asn	Arg	Leu	Ser	His	Pro	Asn
		100					105					110			
Ile	Leu	Arg	Phe	Met	Gly	Val	Cys	Val	His	Gln	Gly	Gln	Leu	His	Ala
	115					120					125				
Leu	Thr	Glu	Tyr	Ile	Asn	Ser	Gly	Asn	Leu	Glu	Gln	Leu	Leu	Asp	Ser
	130				135					140					
Asn	Leu	His	Leu	Pro	Trp	Thr	Val	Arg	Val	Lys	Leu	Ala	Tyr	Asp	Ile
145				150					155					160	
Ala	Val	Gly	Leu	Ser	Tyr	Leu	His	Phe	Lys	Gly	Ile	Phe	His	Arg	Asp
			165					170					175		
Leu	Thr	Ser	Lys	Asn	Cys	Leu	Ile	Lys	Arg	Asp	Glu	Asn	Gly	Tyr	Ser

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Ala	Val	Val	Ala	Asp	Phe	Gly	Leu	Ala	Glu	Lys	Ile	Pro	Asp	Val	Ser					
195							200							205						
Met	Gly	Ser	Glu	Lys	Leu	Ala	Val	Val	Gly	Ser	Pro	Phe	Trp	Met	Ala					
210							215							220						
Pro	Glu	Val	Leu	Arg	Asp	Glu	Pro	Tyr	Asn	Glu	Lys	Ala	Asp	Val	Phe					
225							230							235						
Ser	Tyr	Gly	Ile	Ile	Leu	Cys	Glu	Ile	Ile	Val	Arg	Ile	Gln	Ala	Asp					
245							250							255						
Pro	Asp	Tyr	Leu	Pro	Arg	Thr	Glu	Asn	Phe	Gly	Leu	Asp	Tyr	Asp	Ala					
260							265							270						
Phe	Gln	His	Met	Val	Gly	Asp	Cys	Pro	Pro	Asp	Phe	Leu	Gln	Leu	Thr					
275							280							285						
Phe	Asn	Cys	Cys	Asn	Val	Ser	Val	Phe	Leu	Pro	Leu	Pro	Phe	Ile	Arg					
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<210> 3011

<211> 3253

<212> DNA

<213> Homo sapiens

<400> 3011

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<210> 3012

<211> 870

<212> PRT

<213> Homo sapiens

<400> 3012

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			20					25					30		
Leu	Glu	Gln	Asp	Thr	Gln	Gly	Leu	Asp	Gly	Trp	Trp	Leu	Cys	Ser	Leu
			35				40					45			
His	Gly	Arg	Gln	Gly	Ile	Val	Pro	Gly	Asn	Arg	Leu	Lys	Ile	Leu	Val
			50			55					60				
Gly	Met	Tyr	Asp	Lys	Lys	Pro	Ala	Gly	Pro	Gly	Ser	Gly	Pro	Pro	Ala
65					70					75				80	
Thr	Pro	Ala	Gln	Pro	Gln	Pro	Gly	Leu	His	Ala	Pro	Ala	Pro	Pro	Ala
			85					90					95		
Ser	Gln	Tyr	Thr	Pro	Met	Leu	Pro	Asn	Thr	Tyr	Gln	Pro	Gln	Pro	Asp
			100					105				110			
Ser	Val	Tyr	Leu	Val	Pro	Thr	Pro	Ser	Lys	Ala	Gln	Gln	Gly	Leu	Tyr
			115				120					125			
Gln	Val	Pro	Gly	Pro	Ser	Pro	Gln	Phe	Gln	Ser	Pro	Pro	Ala	Lys	Gln
			130				135				140				
Thr	Ser	Thr	Phe	Ser	Lys	Gln	Thr	Pro	His	His	Pro	Phe	Pro	Ser	Pro
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Ala	Thr	Asp	Leu	Tyr	Gln	Val	Pro	Pro	Gly	Pro	Gly	Gly	Pro	Ala	Gln

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Leu	Ala	Pro	Gly	Pro	Gln	Asp	Ile	Tyr	Asp	Val	Pro	Pro	Val	Arg	Gly	
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Val	Pro	Pro	Ser	Val	Glu	Lys	Gly	Leu	Pro	Pro	Ser	Asn	His	His	Ala	
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Val	Tyr	Asp	Val	Pro	Ser	Val	Ser	Lys	Asp	Val	Pro	Asp	Gly	Pro	Pro	
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Leu	Leu	Arg	Glu	Glu	Thr	Tyr	Asp	Val	Pro	Pro	Ala	Phe	Ala	Lys	Ala	
			325						330					335		
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Pro	Asp	Leu	Tyr	Asp	Val	Pro	Pro	Gly	Leu	Arg	Arg	Pro	Gly	Pro	Gly	
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Thr	Leu	Tyr	Asp	Val	Pro	Arg	Glu	Arg	Val	Leu	Pro	Pro	Glu	Val	Ala	
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Asp	Gly	Gly	Val	Val	Asp	Ser	Gly	Val	Tyr	Ala	Val	Pro	Pro	Pro	Ala	
			405						410					415		
Glu	Arg	Glu	Ala	Pro	Ala	Glu	Gly	Lys	Arg	Leu	Ser	Ala	Ser	Ser	Thr	
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Gly	Ser	Thr	Arg	Ser	Ser	Gln	Ser	Ala	Ser	Ser	Leu	Glu	Val	Ala	Gly	
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Ala	Gly	Ser	Ala	Gly	Ala	Thr	Gly	Gly	Trp	Arg	Ser	Pro	Ser	Glu	Pro	
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Gln	Glu	Pro	Leu	Val	Gln	Asp	Leu	Gln	Ala	Ala	Val	Ala	Ala	Val	Gln	
		500						50								

595	600	605
Lys Ala Thr Ala Pro Gly	Pro Glu Gly Gly Gly Thr	Leu His Pro Asn
610	615	620
Pro Thr Asp Lys Thr Ser	Ser Ile Gln Ser Arg Pro	Leu Pro Ser Pro
625	630	635
Pro Lys Phe Thr Ser	Gln Asp Ser Pro Asp Gly	Gln Tyr Glu Asn Ser
645	650	655
Glu Gly Gly Trp Met Glu	Asp Tyr Asp Tyr Val His	Leu Gln Gly Lys
660	665	670
Glu Glu Phe Glu Lys Thr	Gln Lys Glu Leu Leu Glu	Lys Gly Asn Ile
675	680	685
Thr Arg Gln Gly Lys Ser	Gln Leu Glu Leu Gln Gln	Leu Lys Gln Phe
690	695	700
Glu Arg Leu Glu Gln Glu	Val Ser Arg Pro Ile Asp	His Asp Leu Ala
705	710	715
Asn Trp Thr Pro Ala Gln	Pro Leu Ala Pro Gly Arg	Thr Gly Gly Leu
725	730	735
Gly Pro Ser Asp Arg Gln	Leu Leu Leu Phe Tyr Leu	Glu Gln Cys Glu
740	745	750
Ala Asn Leu Thr Thr Leu	Thr Asn Ala Val Asp Ala	Phe Phe Thr Ala
755	760	765
Val Ala Thr Asn Gln Pro	Pro Lys Ile Phe Val Ala	His Ser Lys Phe
770	775	780
Val Ile Leu Ser Ala His	Lys Leu Val Phe Ile Gly	Asp Thr Leu Ser
785	790	795
Arg Gln Ala Lys Ala Ala	Asp Val Arg Ser Gln Val	Thr His Tyr Ser
805	810	815
Asn Leu Leu Cys Asp Leu	Leu Arg Gly Ile Val Ala	Thr Thr Lys Ala
820	825	830
Ala Ala Leu Gln Tyr Pro	Ser Pro Ser Ala Ala Gln	Asp Met Val Glu
835	840	845
Arg Val Lys Glu Leu Gly	His Ser Thr Gln Gln Phe	Arg Arg Val Leu
850	855	860
Gly Gln Leu Ala Ala Ala		
865	870	

<210> 3013

<211> 248

<212> DNA

<213> Homo sapiens

<400> 3013

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120

gaccaggtgc tggaggagca gaccaaggca ggcgagcagg ctgggtgggg cctcctcctt

180

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240

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248

<210> 3014

<211> 82
 <212> PRT
 <213> Homo sapiens

<400> 3014
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 1 5 10 15
 Glu Lys Met Cys Glu Glu Ser Ala Ser Phe Asp Leu Thr Pro His Asp
 20 25 30
 Leu Ala Ser Gly Leu Asp Val Ile Asp Gln Val Leu Glu Glu Gln Thr
 35 40 45
 Lys Ala Ala Gln Gln Ala Gly Trp Gly Leu Leu Leu Ala Arg Arg Trp
 50 55 60
 Val Ala Pro Pro Arg Pro Thr Val Ile Leu Leu Arg Leu Glu Gly Ala
 65 70 75 80
 Ile Asp

<210> 3015
 <211> 438
 <212> DNA
 <213> Homo sapiens

<400> 3015
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 120
 ccggagaagc attttcacia cttaaacttga cctgacccag ctgcacggtg actggctcca
 180
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 240
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 300
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 420
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 438

<210> 3016
 <211> 103
 <212> PRT
 <213> Homo sapiens

<400> 3016
 Met Ser Thr Cys Cys Trp Pro Ser Ile Pro Glu Phe Pro Asn Ile Phe
 1 5 10 15
 His Gln Ser Leu Pro Asn His Asn Val Thr Arg Thr Pro Pro Pro Arg
 20 25 30
 Lys Pro Pro Trp Gln Leu Cys Pro Arg Ala Phe Ala Phe Cys His Arg
 35 40 45
 Val Pro Gly Gly Met Val His Pro Ile Phe Leu Glu Pro Val Thr Val

50	55	60
Gln Leu Gly Gln Val Lys Phe Ser Cys Glu Asn Ala Ser Pro Asp Thr		
65	70	75
Arg Cys Val Gly Gln Leu Ser Ile Pro Ser Pro Arg Met Pro Trp Gly		80
	85	90
Arg Leu Gln Ala Arg Tyr Val		95
100		

<210> 3017
 <211> 4796
 <212> DNA
 <213> Homo sapiens

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 180
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 240
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 300
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 420
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 480
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 540
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 660
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 720
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 780
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 960
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 1020
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 1140
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 1200

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 1320
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 1380
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3420
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3960
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 4560
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 4680
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<210> 3018

<211> 104

<212> PRT

<213> Homo sapiens

<400> 3018

Cys	His	Leu	Glu	Gln	Val	His	Leu	Lys	Pro	Ile	Pro	Lys	Asp	Thr	Pro
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Thr	Thr	Pro	Thr	Pro	Thr	Leu	Ala	Cys	Pro	Ser	Pro	Gln	Cys	Ala	Phe
		20						25				30			
Gln	Arg	Trp	Ile	Thr	Ile	Gln	His	Arg	Trp	Ser	Ser	Ala	Leu	His	Cys
	35					40						45			
Gln	Gly	Leu	Thr	Pro	Thr	Pro	Gly	Ala	Leu	Pro	Asn	Tyr	Leu	Lys	Val
	50					55					60				
Lys	Ala	Asn	Arg	Ala	Ile	Pro	Gln	Ala	Val	Thr	Ser	Thr	Arg	Leu	Gly
65					70					75				80	
Thr	Thr	Lys	Pro	Pro	Cys	Thr	Ile	Thr	Pro	Pro	Cys	Arg	Ala	Val	Arg
				85					90					95	
Ser	Thr	Ser	Pro	Arg	Leu	Pro	Thr								
					100										

<210> 3019

<211> 882

<212> DNA

<213> Homo sapiens

<400> 3019

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 120
 gcgctgtgtc cgtcgccatg acagatcaga cctattgtga ccgcctgggtg caggacacgc
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 240
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 300
 ccggaacccc aaggcatcct tgcgtgtgcg gctctgtgac ctctgagcc acctgcagcg
 360
 gagctgtgag cgggactgcc aggagttcta ccgagccctg tatatccatg cccagccctt
 420

gcacagccgc ctgcccagcc gccacgctct gcagaactca gattgcacag agctagactc
 480
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 540
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 600
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 660
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 720
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 780
 tttctaaatg catatctttc attatttata atttggtgtaa aaaacacacc ttcaccttac
 840
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 882

<210> 3020

<211> 58

<212> PRT

<213> Homo sapiens

<400> 3020

Gln	Gly	Thr	His	Glu	Leu	Pro	Gly	Trp	Pro	Gly	Pro	Cys	Cys	Gly	Thr
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Gly	Pro	Ala	Pro	Val	Leu	Leu	Ser	Ala	Arg	Pro	Gln	Gly	Pro	Ala	Arg
			20					25					30		
Asp	Pro	Ala	Arg	Pro	Arg	Phe	Leu	Ala	Cys	His	His	Arg	Gln	Thr	Cys
		35					40					45			
Gln	Pro	Leu	Pro	Ala	Gly	Leu	Pro	Gly	Arg						
	50					55									

<210> 3021

<211> 1008

<212> DNA

<213> Homo sapiens

<400> 3021

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 120
 gggcatgtgg gtgccttggg gtagggtaaa ggttccatct tgatcgcggt ggtgtttccc
 180
 aagtgatac actcacaaa actatactta gaactcaaaa ctgcctaaat atatacttaa
 240
 aatggatgca gttgggttat tataaattat acctcaataa agttgattaa aaacatcaat
 300
 tcctcagaaa attcttttct gaccactccc ctctcagacg aggtcggggc tcctgggatg
 360
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 420
 tccaggctgg agtgcaaggc cgcaatcatg gatcactgca gccttgacct tcctgggtca
 480

agtgatcctc cgggtcacc ccagtagct ggaaccacag gcgcgcttcc acaccggaaa
 540
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 600
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 660
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 780
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 900
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 1008

<210> 3022

<211> 94

<212> PRT

<213> Homo sapiens

<400> 3022

Met	His	Thr	His	Thr	His	Tyr	Asn	Leu	Tyr	Leu	Phe	Phe	Leu	Lys	His
1				5					10					15	
Gly	Leu	Phe	Leu	Ser	Ser	Arg	Leu	Glu	Cys	Ser	Gly	Ala	Ile	Met	Asp
			20					25					30		
His	Cys	Ser	Leu	Asp	Leu	Pro	Gly	Ser	Ser	Asp	Pro	Pro	Gly	Ser	Pro
		35					40					45			
Pro	Val	Ala	Gly	Thr	Thr	Gly	Ala	Leu	Pro	His	Arg	Lys	Ala	His	Phe
	50					55					60				
Leu	Glu	Ala	Glu	Thr	Glu	Ala	Pro	Ser	Gly	Lys	Gly	Asp	Pro	Pro	Gly
65					70					75				80	
Met	Arg	Gly	Ala	Gln	Arg	Ala	Ala	Thr	Trp	Gly	Pro	Thr	Arg		
				85					90						

<210> 3023

<211> 1834

<212> DNA

<213> Homo sapiens

<400> 3023

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 120
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 180
 aatgattgaa ataataaaca tttttcttat tcaagatttc gtcattggta ttgtaaagga
 240
 aaccctagga aaatggtgaa aacttgggca gaaaaagaaa tgagggaactt aatcaggcta
 300

aacacagcag agataccatg tccagaacca ataatgctaa gaagtcatgt tcttgtcatg
360
agtttcatcg gtaaagatga catgcctgca ccactcttga aaaatgtcca gttatcagaa
420
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480
gccagacttg tccatgcaga tctcagtga tttaacatgc tgtaccacgg tggaggcgtg
540
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600
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660
gtgcggggagc tctttgaatt tgtcacagat ccatccatta cacatgagaa catggatgct
720
tatctctcaa aggccatgga aatagcatct caaaggacca aggaagaacg gtctagccaa
780
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1834

<210> 3024

<211> 347

<212> PRT

<213> Homo sapiens

<400> 3024

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Gly	Asn	Pro	Arg	Lys	Met	Val	Lys	Thr	Trp	Ala	Glu	Lys	Glu	Met	Arg
			20					25					30		
Asn	Leu	Ile	Arg	Leu	Asn	Thr	Ala	Glu	Ile	Pro	Cys	Pro	Glu	Pro	Ile
		35					40					45			
Met	Leu	Arg	Ser	His	Val	Leu	Val	Met	Ser	Phe	Ile	Gly	Lys	Asp	Asp
	50					55					60				
Met	Pro	Ala	Pro	Leu	Leu	Lys	Asn	Val	Gln	Leu	Ser	Glu	Ser	Lys	Ala
65					70					75				80	
Arg	Glu	Leu	Tyr	Leu	Gln	Val	Ile	Gln	Tyr	Met	Arg	Arg	Met	Tyr	Gln
			85					90						95	
Asp	Ala	Arg	Leu	Val	His	Ala	Asp	Leu	Ser	Glu	Phe	Asn	Met	Leu	Tyr
		100					105						110		
His	Gly	Gly	Gly	Val	Tyr	Ile	Ile	Asp	Val	Ser	Gln	Ser	Val	Glu	His
	115						120					125			
Asp	His	Pro	His	Ala	Leu	Glu	Phe	Leu	Arg	Lys	Asp	Cys	Ala	Asn	Val
	130					135					140				
Asn	Asp	Phe	Phe	Met	Arg	His	Ser	Val	Ala	Val	Met	Thr	Val	Arg	Glu
145					150					155					160
Leu	Phe	Glu	Phe	Val	Thr	Asp	Pro	Ser	Ile	Thr	His	Glu	Asn	Met	Asp
				165					170					175	
Ala	Tyr	Leu	Ser	Lys	Ala	Met	Glu	Ile	Ala	Ser	Gln	Arg	Thr	Lys	Glu
		180						185					190		
Glu	Arg	Ser	Ser	Gln	Asp	His	Val	Asp	Glu	Glu	Val	Phe	Lys	Arg	Ala
	195						200					205			
Tyr	Ile	Pro	Arg	Thr	Leu	Asn	Glu	Val	Lys	Asn	Tyr	Glu	Arg	Asp	Met
	210					215					220				
Asp	Ile	Ile	Met	Lys	Leu	Lys	Glu	Glu	Asp	Met	Ala	Met	Asn	Ala	Gln
225					230					235				240	
Gln	Asp	Asn	Ile	Leu	Pro	Asp	Cys	Tyr	Arg	Ile	Glu	Glu	Arg	Phe	Val
			245						250					255	
Arg	Ser	Ser	Glu	Gly	Pro	Cys	Thr	Leu	Glu	Asn	Gln	Val	Glu	Glu	Arg
		260						265					270		
Thr	Cys	Ser	Asp	Ser	Glu	Asp	Ile	Gly	Ser	Ser	Glu	Cys	Ser	Asp	Thr
	275						280					285			
Asp	Ser	Glu	Glu	Gln	Gly	Asp	His	Ala	Arg	Pro	Lys	Lys	His	Thr	Thr
	290					295					300				
Asp	Pro	Asp	Ile	Asp	Lys	Lys	Glu	Arg	Lys	Lys	Met	Val	Lys	Glu	Ala
305					310					315					320
Gln	Arg	Glu	Lys	Arg	Lys	Asn	Lys	Ile	Pro	Lys	His	Val	Lys	Lys	Arg
			325						330					335	
Lys	Glu	Lys	Thr	Ala	Lys	Thr	Lys	Lys	Gly	Lys					
			340					345							

<210> 3025

<211> 1370

<212> DNA

<213> Homo sapiens

<400> 3025

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120
agcttctgaa gcatctaggt gatcttctta aatctttgac aggaaagagt aggaaacttt
180
ttggcagact tttacctggt gaatggactt gttttagaat caaggaaaag aagagaacat
240
ctcagtgaag aggatattct tcgaaataag gccatcatgg agagtttgag taaaggtgga
300
aacataatgg aacagaattt tgagccgatt cgaagacagt ctcttacacc tcctcctcag
360
aacactatta catgggaaga atatatatct gctgaaaatg gaaaagctcc tcactctgggt
420
agagaattgg tgtgcaaaga gagtaagaaa acgttttaaag ctacgatagc catgagccag
480
gaatttcctt tagggataga gttattattg aatgttttag aagtagtagc tccttcaag
540
cactttaaca agcttagaga atttgttcag atgaagcttc ctccaggctt tcctgtaaaa
600
ttagatatac ctgtgtttcc cacaatcaca gccactgtga cttttcagga gtttcgatac
660
gatgaatttg atggctccat ctttactata cctgatgact acaaggaaga cccaagccgt
720
tttctgatac ttttaactgac gtggaaaagg atgccgtcta accaaggaaa gaaaatacag
780
agaccctaga agtggatcca aatagaaggg acaaatgctt tcagtgaaga aaagggaatt
840
acacattgaa tcgacacatc agtaatacga tacagtgaag tgggcctcta ataagaattt
900
cagcgagttt tctgatgtgc catTTTTTgt ctttttaaaa atatacatat tataaatgta
960
atagtttgac acattaatga ccctaagacc tgcgtatgtg aagcagctat gagtgtgtg
1020
atTTgtttt aaaaattttt acacttcttg ttgaaatata tatgcatata aatatatcta
1080
tatctatata tatatctaaa acactcctgg accattaacg taaattaaat gtcttaagag
1140
atatggagcc cttttaaact tgTcatctt atgcaaggTg acatttataa atattccttc
1200
gagctttgtt ttcataaaat gtaaactatg taacattatg tatagttcag taatttgaat
1260
gtttgttcaa tataatgaac tagaagggaat gcaattttct gtagatgaat gaaccaaag
1320
gtaaccatta aacaattgca tttaaaaaaa aaaaaaaaaa aaaaaaaaaa
1370

<210> 3026

<211> 152

<212> PRT

<213> Homo sapiens

<400> 3026

Met Glu Ser Leu Ser Lys Gly Gly Asn Ile Met Glu Gln Asn Phe Glu
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 Pro Ile Arg Arg Gln Ser Leu Thr Pro Pro Pro Gln Asn Thr Ile Thr
 20 25 30
 Trp Glu Glu Tyr Ile Ser Ala Glu Asn Gly Lys Ala Pro His Leu Gly
 35 40 45
 Arg Glu Leu Val Cys Lys Glu Ser Lys Lys Thr Phe Lys Ala Thr Ile
 50 55 60
 Ala Met Ser Gln Glu Phe Pro Leu Gly Ile Glu Leu Leu Leu Asn Val
 65 70 75 80
 Leu Glu Val Val Ala Pro Phe Lys His Phe Asn Lys Leu Arg Glu Phe
 85 90 95
 Val Gln Met Lys Leu Pro Pro Gly Phe Pro Val Lys Leu Asp Ile Pro
 100 105 110
 Val Phe Pro Thr Ile Thr Ala Thr Val Thr Phe Gln Glu Phe Arg Tyr
 115 120 125
 Asp Glu Phe Asp Gly Ser Ile Phe Thr Ile Pro Asp Asp Tyr Lys Glu
 130 135 140
 Asp Pro Ser Arg Phe Pro Asp Leu
 145 150

<210> 3027

<211> 1154

<212> DNA

<213> Homo sapiens

<400> 3027

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 atccacgcca aggccttttg atcggccgtg ggtacatccg tctgagccgt tcctttccat
 120
 cgcagacggc ggccctccgcg gcgctctcca gtcattggact accggcggct tctcatgagc
 180
 cgggtggtcc cggggcaatt cgacgacgcg gactcctctg acagtgaaaa cagagacttg
 240
 aagacagtca aagagaagga tgacattctg tttgaagacc ttcaagacaa tgtgaatgag
 300
 aatggtgaag gtgaaataga agatgaggag gaggagggtt atgatgatga tgatgatgac
 360
 tgggactggg atgaaggagt tggaaaactc gccaaagggtt atgtctggaa tggaggaagc
 420
 aacccacagg caaatcgaca gacctccgac agcagttcag ccaaaatgtc tactccagca
 480
 gacaaggtct tacggaaatt tgagaataaa attaatttag ataagctaaa tgttactgat
 540
 tccgtcataa ataaagtcac cgaaaagtct agacaaaagg aagcagatat gtatcgcac
 600
 aaagataagg cagacagagc aactgtagaa cagggtgttg atcccagaac aagaatgatt
 660
 ttattcaaga tgttgactag aggaatcata acagagataa atggctgcat tagcacagga
 720
 aaagaagcta atgtatacca tgctagcaca gcaaatggag agagcagagc aatcaaaatt
 780

tataaaactt ctattttggt gttcaaagat cgggataaat atgtaagtgg agaattcaga
840
tttcgcatg gctattgtaa aggaaaccct aggaaaatgg tgaaaacttg ggcagaaaaa
900
gaaatgagga acttaatcag gctaaacaca gcagagatac catgtccaga accaataatg
960
ctaagaagtc atgttcttgt catgagtttc atcggtaaag atgacatttc ttttcattca
1020
aggcctgcac cactcttgaa aaatgtccag ttatcagaat ccaaggctcg ggagttgtac
1080
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1140
cgtcggtgag aggc
1154

<210> 3028

<211> 331

<212> PRT

<213> Homo sapiens

<400> 3028

Met	Asp	Tyr	Arg	Arg	Leu	Leu	Met	Ser	Arg	Val	Val	Pro	Gly	Gln	Phe
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Asp	Asp	Ala	Asp	Ser	Ser	Asp	Ser	Glu	Asn	Arg	Asp	Leu	Lys	Thr	Val
			20					25					30		
Lys	Glu	Lys	Asp	Asp	Ile	Leu	Phe	Glu	Asp	Leu	Gln	Asp	Asn	Val	Asn
		35					40						45		
Glu	Asn	Gly	Glu	Gly	Glu	Ile	Glu	Asp	Glu	Glu	Glu	Glu	Gly	Tyr	Asp
	50					55					60				
Asp	Asp	Asp	Asp	Asp	Trp	Asp	Trp	Asp	Glu	Gly	Val	Gly	Lys	Leu	Ala
65					70					75					80
Lys	Gly	Tyr	Val	Trp	Asn	Gly	Gly	Ser	Asn	Pro	Gln	Ala	Asn	Arg	Gln
				85					90					95	
Thr	Ser	Asp	Ser	Ser	Ser	Ala	Lys	Met	Ser	Thr	Pro	Ala	Asp	Lys	Val
				100				105					110		
Leu	Arg	Lys	Phe	Glu	Asn	Lys	Ile	Asn	Leu	Asp	Lys	Leu	Asn	Val	Thr
		115					120						125		
Asp	Ser	Val	Ile	Asn	Lys	Val	Thr	Glu	Lys	Ser	Arg	Gln	Lys	Glu	Ala
		130				135					140				
Asp	Met	Tyr	Arg	Ile	Lys	Asp	Lys	Ala	Asp	Arg	Ala	Thr	Val	Glu	Gln
145					150					155					160
Val	Leu	Asp	Pro	Arg	Thr	Arg	Met	Ile	Leu	Phe	Lys	Met	Leu	Thr	Arg
				165					170					175	
Gly	Ile	Ile	Thr	Glu	Ile	Asn	Gly	Cys	Ile	Ser	Thr	Gly	Lys	Glu	Ala
			180				185						190		
Asn	Val	Tyr	His	Ala	Ser	Thr	Ala	Asn	Gly	Glu	Ser	Arg	Ala	Ile	Lys
		195					200					205			
Ile	Tyr	Lys	Thr	Ser	Ile	Leu	Val	Phe	Lys	Asp	Arg	Asp	Lys	Tyr	Val
	210					215					220				
Ser	Gly	Glu	Phe	Arg	Phe	Arg	His	Gly	Tyr	Cys	Lys	Gly	Asn	Pro	Arg
225					230					235					240
Lys	Met	Val	Lys	Thr	Trp	Ala	Glu	Lys	Glu	Met	Arg	Asn	Leu	Ile	Arg
				245					250					255	
Leu	Asn	Thr	Ala	Glu	Ile	Pro	Cys	Pro	Glu	Pro	Ile	Met	Leu	Arg	Ser

[illegible]

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<210> 3029
<211> 344
<212> DNA
<213> Homo sapiens
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<400> 3029
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ctgaaaagat tcgattttga ttatacaacc atgcatagga ttaaaactgaa tgatcgaatg
120
acatttcccg aggaactaga tatgagtact tttattgatg ttgaagatga aaaatctcct
180
cagactgaaa gttgcactga caggggagca gaaaatgaag gtagttgtca cagtgatcag
240
atgagcaacg atttctccaa tgatgatggt gttgatgaag gaatctgttt tgaaaccaat
300
agtggaactg aaaagatctc aaaatctgga cctgaaaaga attc
344
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<210> 3030
<211> 114
<212> PRT
<213> Homo sapiens
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<400> 3030
Thr Arg Asp Ala Arg Lys Gly Leu Arg Phe Leu His Phe Pro Tyr Leu
 1                    5                      10                15
Leu Thr Leu Gln Leu Lys Arg Phe Asp Phe Asp Tyr Thr Thr Met His
                20                      25                30
Arg Ile Lys Leu Asn Asp Arg Met Thr Phe Pro Glu Glu Leu Asp Met
                35                      40                45
Ser Thr Phe Ile Asp Val Glu Asp Glu Lys Ser Pro Gln Thr Glu Ser
    50                      55                60
Cys Thr Asp Arg Gly Ala Glu Asn Glu Gly Ser Cys His Ser Asp Gln
65                70                      75                80
Met Ser Asn Asp Phe Ser Asn Asp Asp Gly Val Asp Glu Gly Ile Cys
                85                      90                95
Phe Glu Thr Asn Ser Gly Thr Glu Lys Ile Ser Lys Ser Gly Pro Glu
                100                      105                110
Lys Asn

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<210> 3031
<211> 567
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<212> DNA

<213> Homo sapiens

<400> 3031

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 120
 gttggtcctg atgttattcc cctgccacac atctacggag ctggaatcaa aggtgtggaa
 180
 gtgttctgtc ctctggatcc cccgccgcca tatgaagctg tggtgagcca gatggaccag
 240
 gagcagggat cttcattcca aatgtcagaa ggatcagaag ctgctgtgat cccattggat
 300
 ctgggctgca cacaagtgc tcaagatggg gacattccta acatacctgc cgaagaaaat
 360
 gcatccacct caactcccag ttcaaccctg gtgcgtccta tcagaagccg gagagccctc
 420
 ccacccttga ggaccaggtc gaagagtgac cctgtgctcc atccttctga ggagagagct
 480
 gccccagtgc tcagctgtga agctgcaaca cagactgaaa ggagactgga tctggctgca
 540
 gtgactctga ggagaggctt gagatct
 567

<210> 3032

<211> 189

<212> PRT

<213> Homo sapiens

<400> 3032

Ala	Glu	Glu	Ala	Glu	Asp	His	Gly	Arg	Ile	Pro	Asp	Pro	Asp	Asp	Phe
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Val	Pro	Pro	Val	Pro	Pro	Pro	Ser	Tyr	Phe	Ala	Thr	Phe	Tyr	Ser	Cys
			20					25					30		
Thr	Pro	Arg	Met	Asn	Arg	Arg	Leu	Val	Gly	Pro	Asp	Val	Ile	Pro	Leu
			35				40					45			
Pro	His	Ile	Tyr	Gly	Ala	Arg	Ile	Lys	Gly	Val	Glu	Val	Phe	Cys	Pro
	50					55					60				
Leu	Asp	Pro	Pro	Pro	Pro	Tyr	Glu	Ala	Val	Val	Ser	Gln	Met	Asp	Gln
65					70					75				80	
Glu	Gln	Gly	Ser	Ser	Phe	Gln	Met	Ser	Glu	Gly	Ser	Glu	Ala	Ala	Val
			85						90					95	
Ile	Pro	Leu	Asp	Leu	Gly	Cys	Thr	Gln	Val	Thr	Gln	Asp	Gly	Asp	Ile
		100						105				110			
Pro	Asn	Ile	Pro	Ala	Glu	Glu	Asn	Ala	Ser	Thr	Ser	Thr	Pro	Ser	Ser
		115					120					125			
Thr	Leu	Val	Arg	Pro	Ile	Arg	Ser	Arg	Arg	Ala	Leu	Pro	Pro	Leu	Arg
	130					135					140				
Thr	Arg	Ser	Lys	Ser	Asp	Pro	Val	Leu	His	Pro	Ser	Glu	Glu	Arg	Ala
145					150					155				160	
Ala	Pro	Val	Leu	Ser	Cys	Glu	Ala	Ala	Thr	Gln	Thr	Glu	Arg	Arg	Leu
			165						170					175	
Asp	Leu	Ala	Ala	Val	Thr	Leu	Arg	Arg	Gly	Leu	Arg	Ser			

180

185

<210> 3033

<211> 821

<212> DNA

<213> Homo sapiens

<400> 3033

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 120
 tactatgata aattatttaa ggaatactgc atagcagatc tcagtaaata taaagaaaat
 180
 aagtttggat ttaggtggcg agtagaaaaa gaagtaattt caggaaaagg tcaatttttc
 240
 tgtggaaata aatattgtga taaaaaagaa ggcttaaaga gttgggaagt taattttggt
 300
 tatattgagc atggtgagaa gagaaatgca cttgttaaata taaggttatg ccaagaatgt
 360
 tccattaaat taaatttcca tcacaggaga aaagaaatca agtcaaaaaa aagaaaagat
 420
 aaaacccaaa aagactgtga agagtcacata cataaaaaat ccagattatc ttctgcagaa
 480
 gaggcctcca agaaaaaaga taaaggacat tcatcttcaa agaaatctga agattctcta
 540
 cttagaaact ctgatgagga agaaagtgtc tcagaatctg aactttggaa ggggccacta
 600
 ccagagacag atgaaaaatc acaggaagaa gaatttgatg agtattttca ggatttggtt
 660
 ctatgagacg agagagagaa gcctccgctc cttaatgtga aacttcatga agttttaaac
 720
 ctcatgcaat ttgaaattcc atctacgtct ttatctgcaa gttacagctt ctgtgctttg
 780
 tcttcgcaac tacaaatcca ggttctctca gcaacaacac a
 821

<210> 3034

<211> 221

<212> PRT

<213> Homo sapiens

<400> 3034

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 Glu Asn His Arg Phe Leu Trp Asn Glu Asp Glu Met Asp Met Thr
 20 25 30
 Trp Glu Lys Arg Leu Ala Lys Lys Tyr Tyr Asp Lys Leu Phe Lys Glu
 35 40 45
 Tyr Cys Ile Ala Asp Leu Ser Lys Tyr Lys Glu Asn Lys Phe Gly Phe
 50 55 60
 Arg Trp Arg Val Glu Lys Glu Val Ile Ser Gly Lys Gly Gln Phe Phe
 65 70 75 80
 Cys Gly Asn Lys Tyr Cys Asp Lys Lys Glu Gly Leu Lys Ser Trp Glu

				85					90					95					
Val	Asn	Phe	Gly	Tyr	Ile	Glu	His	Gly	Glu	Lys	Arg	Asn	Ala	Leu	Val				
			100					105					110						
Lys	Leu	Arg	Leu	Cys	Gln	Glu	Cys	Ser	Ile	Lys	Leu	Asn	Phe	His	His				
		115					120					125							
Arg	Arg	Lys	Glu	Ile	Lys	Ser	Lys	Lys	Arg	Lys	Asp	Lys	Thr	Lys	Lys				
		130				135					140								
Asp	Cys	Glu	Glu	Ser	Ser	His	Lys	Lys	Ser	Arg	Leu	Ser	Ser	Ala	Glu				
145					150				155					160					
Glu	Ala	Ser	Lys	Lys	Lys	Asp	Lys	Gly	His	Ser	Ser	Ser	Lys	Lys	Ser				
			165					170					175						
Glu	Asp	Ser	Leu	Leu	Arg	Asn	Ser	Asp	Glu	Glu	Glu	Ser	Ala	Ser	Glu				
		180					185					190							
Ser	Glu	Leu	Trp	Lys	Gly	Pro	Leu	Pro	Glu	Thr	Asp	Glu	Lys	Ser	Gln				
	195					200					205								
Glu	Glu	Glu	Phe	Asp	Glu	Tyr	Phe	Gln	Asp	Leu	Phe	Leu							
	210					215					220								

<210> 3035

<211> 878

<212> DNA

<213> Homo sapiens

<400> 3035

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120
cctcagacca cgacaggggc ctccacaca cggtcgcag aacctgtgca aggagaacca
180
caaaggatga gcactctggc ccacccaaaa ccatggcagc cctgagggca cagactggac
240
acctgcaga gtctcactct gtcattcagg gtggagtgc atggcgcaat ctcaagtcac
300
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360
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420
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480
atgctctgcc ccatggctac ccgtgctgc ctgcaagggt ccagagtcac gtccccagt
540
agtctctgac ccggcgcca gcacaccagt gtgaatcac tgtgtccca gtgagtctct
600
gacccggcgg ccagcgcacc agtgtgaatc acatgcgtcc ccagtgagtc tctgaccgg
660
cgaccagagc accagtgtga atcacatgcg tccccgggta gtctctgcag ggtgtccagt
720
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780
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878

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<210> 3036
 <211> 65
 <212> PRT
 <213> Homo sapiens

<400> 3036
 Gly His Arg Leu Asp Thr Leu Gln Ser Leu Thr Leu Ser Phe Arg Val
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 Glu Cys Asn Gly Ala Ile Ser Ala His Cys Asn Leu Pro Leu Pro Gly
 20 25 30
 Ser Ser Asn Ser Pro Asp Pro His Ser Gly Pro Ala Pro Ser Gln Thr
 35 40 45
 Val Ile Leu Phe Leu Glu Gly Asn Arg Asp Pro Gly Gly Arg Gly Trp
 50 55 60
 Pro
 65

<210> 3037
 <211> 3538
 <212> DNA
 <213> Homo sapiens

<400> 3037
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 acaaagaac ttcttgatga acaagaacaa gaagatgagg aagccagcac tggatctcat
 120
 ctcaagctca tagtagatgc tttcctacag cagttaccca actgtgtcaa ccgagatctg
 180
 atagacaagg cagcaatgga tttttgcatg aacatgaaca caaaagcaaa caggaagaag
 240
 ttggtacggg cactcttcat agttcctaga caaagggttg atttgctacc attttatgca
 300
 agattggttg ctacattgca tccctgcatg tctgatgtag cagaggatct ttgttccatg
 360
 ctgagggggg atttcagatt tcatgtacgg aaaaaggacc agatcaatat tgaaacaaag
 420
 aataaaaactg ttcgttttat aggagaacta actaagttaa agatgttcac caaaaatgac
 480
 acactgcatt gtttaaagat gcttctgtca gacttctctc atcaccatat tgaaatggca
 540
 tgcaccctgc tggagacatg tggacggttt cttttcagat ctccagaatc tcacctgagg
 600
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 660
 tacgtcaciaa tggtagagaa tgcataattac tactgcaacc cacctccagc tgaaaaaacc
 720
 gtgaaaaaga aacgtcctcc tctccaggaa tatgtccgga aacttttgta caaggatctc
 780
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 840
 gaagtgaag actatgttat ttgttgtatg ataaacatct ggaatgtgaa atataatagt
 900

attcattgtg tagccaacct cttagcagga ctagtgctct accaagagga tgttgggac
960
cacgttggtg atggagtgtt agaagatatt cgattaggaa tggaggttaa tcaacctaaa
1020
tttaatcaga ggcgcacacag cagtgccaaag ttcttaggag aactttacaa ttaccgaatg
1080
gtggaatcag ctgttatttt cagaactctg tattctttta cctcatttgg tgtaaatcct
1140
gatggctctc caagttccct ggaccacac cagcatcttt tcagaattag actcgtatgc
1200
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1260
tgtttccttg tatattttca gcgttatgtt tgggtggaaga aaagtttggg ggtttggaca
1320
aaagaccatc catttcctat tgatatagat tacatgatca gtgatacact agaactgcta
1380
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1440
gaacgagaat tcttaataaa actaggccta gtaaatgaca aagactcaaa agattttatg
1500
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<211> 697

<212> PRT

<213> Homo sapiens

<400> 3038

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Lys Gly Pro Pro Leu Gly Gly Gly Glu Gly Glu Ala Glu Ser Ala Asp		
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Thr Met Pro Phe Val Met Leu Thr Arg Lys Gly Asn Lys Gln Gln Phe		
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Lys Ile Leu Asn Val Pro Met Ser Ser Gln Leu Ala Ala Asn His Trp		
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<210> 3039

<211> 1836

<212> DNA

<213> Homo sapiens

<400> 3039

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<211> 142

<212> PRT

<213> Homo sapiens

<400> 3040

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			20					25					30		
Ala	Arg	Ala	Phe	Glu	Asp	Gln	Arg	Val	Ala	Ser	Phe	Cys	Thr	Leu	Thr
		35				40						45			
Asp	Met	Gln	His	Gly	Gln	Asp	Leu	Glu	Gly	Ala	Gln	Glu	Leu	Pro	Leu
	50					55					60				
Cys	Val	Asp	Pro	Gly	Ser	Gly	Lys	Glu	Phe	Met	Asp	Thr	Thr	Gly	Glu
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			100						105					110					
Gly	Leu	Gln	Ala	Glu	Val	Gln	His	Leu	Arg	Gln	Asp	Asn	Met	Arg	Leu				
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<210> 3041

<211> 1512

<212> DNA

<213> Homo sapiens

<400> 3041

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<211> 360

<212> PRT

<213> Homo sapiens

<400> 3042

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			20					25					30		
Ile	Leu	Leu	His	Gln	Val	Glu	Ala	Leu	Ala	Ala	Ala	Gly	Val	Asp	His
		35					40					45			
Val	Ile	Leu	Ala	Val	Ser	Tyr	Met	Ser	Gln	Val	Leu	Glu	Lys	Glu	Met
	50					55				60					
Lys	Ala	Gln	Glu	Gln	Arg	Leu	Gly	Ile	Arg	Ile	Ser	Met	Ser	His	Glu
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Glu	Glu	Pro	Leu	Gly	Thr	Ala	Gly	Pro	Leu	Ala	Leu	Ala	Arg	Asp	Leu
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Leu	Ser	Glu	Thr	Ala	Asp	Pro	Phe	Phe	Val	Leu	Asn	Ser	Asp	Val	Ile
			100					105					110		
Cys	Asp	Phe	Pro	Phe	Gln	Ala	Met	Val	Gln	Phe	His	Arg	His	His	Gly
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Gln	Glu	Gly	Ser	Ile	Leu	Val	Thr	Lys	Val	Glu	Glu	Pro	Ser	Lys	Tyr
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Ile	Leu	Ser	Pro	Ala	Val	Leu	Arg	Arg	Ile	Gln	Leu	Gln	Pro	Thr	Ser
		180					185						190		
Ile	Glu	Lys	Glu	Val	Phe	Pro	Ile	Met	Ala	Lys	Glu	Gly	Gln	Leu	Tyr
	195						200					205			
Ala	Met	Glu	Leu	Gln	Gly	Phe	Trp	Met	Asp	Ile	Gly	Gln	Pro	Lys	Asp
	210					215					220				
Phe	Leu	Thr	Gly	Met	Cys	Leu	Phe	Leu	Gln	Ser	Leu	Arg	Gln	Lys	Gln
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			245					250						255	
Asp	Pro	Ser	Ala	Arg	Ile	Gly	Gln	Asn	Cys	Ser	Ile	Gly	Pro	Asn	Val
		260					265					270			
Ser	Leu	Gly	Pro	Gly	Val	Val	Val	Glu	Asp	Gly	Val	Cys	Ile	Arg	Arg

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Cys Thr Val Leu Arg Asp	Ala Arg Ile Arg Ser	His Ser Trp Leu Glu
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Ser Cys Ile Val Gly Trp	Arg Cys Arg Val Gly	Gln Trp Val Arg Met
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Glu Asn Val Thr Val Leu	Gly Glu Asp Val Ile	Val Asn Asp Glu Leu
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<211> 394

<212> DNA

<213> Homo sapiens

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240

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<211> 115

<212> PRT

<213> Homo sapiens

<400> 3044

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35 40 45

Asn Asp Thr Gln Pro Glu Asp Pro Lys Thr Gly Ser Pro Leu Lys Cys
50 55 60

Gln Arg His Val Ser Trp Ser Glu Val Arg Glu Ala Asp Ser Gly Leu
65 70 75 80

Leu Leu Gly Gln Thr Pro Val Lys Arg Lys Arg Trp His His Glu Thr
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Ser Ser Phe Ser Pro Cys Leu Trp Leu Lys Ala Arg Ala Ser Arg Ser
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Lys Glu Ile

115

<210> 3045

<211> 605

<212> DNA

<213> Homo sapiens

<400> 3045

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<210> 3046

<211> 72

<212> PRT

<213> Homo sapiens

<400> 3046

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Ser Asp Gly Ile Val Ala His Phe Pro Ala His Glu Lys Pro Val Cys
          20           25           30
Cys Met Ala Phe Asn Thr Ser Gly Met Leu Leu Val Thr Thr Asp Thr
          35           40           45
Leu Gly His Asp Phe His Val Phe Gln Ile Leu Thr His Pro Trp Ser
          50           55           60
Ser Ser Thr Glu Arg Arg Gln Arg
65           70

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<210> 3047

<211> 391

<212> DNA

<213> Homo sapiens

<400> 3047

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 120
 ttggttgagt caggaattca gtttatggat gagccagaaa tggcagtgtt tctgcagaat
 180
 gccaaaaccc tgctaaaaaa aatctcggaa gcatcaaagg catttcagat ggagaaaata
 240
 gaacatggct atgagaacat gaaccacttc acagtcaacc tcaatagaga agaaaagata
 300
 atacgtgaaa ttgactttta cagagaagat gaagatgaag aagaagaaga aggcggagaa
 360
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 391

<210> 3048

<211> 122

<212> PRT

<213> Homo sapiens

<400> 3048

Met	Thr	Gln	Val	Ile	Thr	Arg	Thr	Gln	Glu	Glu	Lys	Leu	Glu	His	Val
1				5				10						15	
Arg	Ala	Leu	Ile	Lys	Lys	Tyr	Ser	Asp	His	Leu	Glu	Asn	Val	Ser	Lys
			20					25					30		
Leu	Val	Glu	Ser	Gly	Ile	Gln	Phe	Met	Asp	Glu	Pro	Glu	Met	Ala	Val
			35				40					45			
Phe	Leu	Gln	Asn	Ala	Lys	Thr	Leu	Leu	Lys	Lys	Ile	Ser	Glu	Ala	Ser
			50			55					60				
Lys	Ala	Phe	Gln	Met	Glu	Lys	Ile	Glu	His	Gly	Tyr	Glu	Asn	Met	Asn
					70				75					80	
His	Phe	Thr	Val	Asn	Leu	Asn	Arg	Glu	Glu	Lys	Ile	Ile	Arg	Glu	Ile
				85					90					95	
Asp	Phe	Tyr	Arg	Glu	Asp	Glu	Asp	Glu	Glu	Glu	Glu	Glu	Gly	Gly	Glu
			100					105					110		
Gly	Glu	Lys	Glu	Glu	Lys	Glu	Lys	Trp	Glu						
			115				120								

<210> 3049

<211> 599

<212> DNA

<213> Homo sapiens

<400> 3049

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 120
 tttccttctc tgaacgaaag ctcggccgag gtgctcgaat acaccattaa ggaagaaaag
 180
 tcgatattgt acctggaagg ctcggtcttt gtgtttgagg acatcttcag attgattgag
 240
 ttctactgtg tcagtagaga cttactgcc ttcacactgc ggctacccca ggccatcctt
 300

gaggccagca gcttcacgga ccttgagacc atcgccaacc tgggtctggg tttctgggac
 360
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 420
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 480
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 599

<210> 3050

<211> 177

<212> PRT

<213> Homo sapiens

<400> 3050

Met	Phe	Leu	Val	Arg	Arg	Asp	Ser	Ser	Ser	Lys	Gln	Leu	Val	Leu	Cys
1				5					10					15	
Val	His	Phe	Pro	Ser	Leu	Asn	Glu	Ser	Ser	Ala	Glu	Val	Leu	Glu	Tyr
			20					25					30		
Thr	Ile	Lys	Glu	Glu	Lys	Ser	Ile	Leu	Tyr	Leu	Glu	Gly	Ser	Ala	Leu
		35				40						45			
Val	Phe	Glu	Asp	Ile	Phe	Arg	Leu	Ile	Ala	Phe	Tyr	Cys	Val	Ser	Arg
	50					55				60					
Asp	Leu	Leu	Pro	Phe	Thr	Leu	Arg	Leu	Pro	Gln	Ala	Ile	Leu	Glu	Ala
65					70					75				80	
Ser	Ser	Phe	Thr	Asp	Leu	Glu	Thr	Ile	Ala	Asn	Leu	Gly	Leu	Gly	Phe
			85					90					95		
Trp	Asp	Ser	Ser	Leu	Asn	Pro	Pro	Gln	Glu	Arg	Gly	Lys	Pro	Ala	Glu
			100					105					110		
Pro	Pro	Arg	Asp	Arg	Ala	Pro	Gly	Phe	Pro	Leu	Val	Ser	Ser	Leu	Arg
		115					120					125			
Pro	Thr	Ala	His	Asp	Ala	Asn	Cys	Ala	Cys	Glu	Ile	Glu	Leu	Ser	Val
	130					135					140				
Gly	Asn	Asp	Arg	Leu	Trp	Phe	Val	Asn	Pro	Ile	Phe	Ile	Glu	Asp	Cys
145				150					155					160	
Ser	Ser	Ala	Leu	Pro	Thr	Asp	Gln	Pro	Pro	Leu	Gly	Asn	Cys	Pro	Ser
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Arg

<210> 3051

<211> 820

<212> DNA

<213> Homo sapiens

<400> 3051

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 120
 tgaagactct caggttacca gcacaatata cccctacat tctctcaca agggactccc
 180

tcctcggcca ccgtcgcaca acaggcctcc tcctccccag tccctggagg gactccgaca
 240
 gatgcactat caccgncaac gactatgaca agtcacccat caagcccaaa atgtggagtg
 300
 agtcctcttt agatgaaccc tatgagaagg tcaagaagcg ctctctcac agccattcca
 360
 gcagccacaa gcgcttcccc agcacaggaa gctgtgcgga agccggcgga ggaagcaact
 420
 ccttgacaaa cagccccatc cgcggcctcc cgcactggaa ctcccagtcc agcatgccgt
 480
 ccacgccaga cctgcgggtc cggagtcccc actacgtcca ttccacgagg tcggtggaca
 540
 tcagccccac ccgactgcac agcctcgcac tgcactttag gcaccggagc tccagcctgg
 600
 agtcccaggg caagctcctg ggctcggaaa acgacaccgg gagccccgac ttctacaccc
 660
 cgcggactcg tagcagcaac ggctcagacc ccatggacga ctgctcgtcg tgcaccagcc
 720
 actcgagctc ggagcactac taccggcgcg agatgaacgc caactactcc acgctggccg
 780
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 820

<210> 3052

<211> 62

<212> PRT

<213> Homo sapiens

<400> 3052

Arg	Leu	Ser	Gly	Tyr	Gln	His	Asn	Ile	Pro	Pro	Thr	Phe	Ser	Ser	Gln
1				5				10						15	
Gly	Thr	Pro	Ser	Ser	Ala	Thr	Val	Ala	Gln	Gln	Ala	Ser	Ser	Ser	Pro
			20					25					30		
Val	Pro	Gly	Gly	Thr	Pro	Thr	Asp	Ala	Leu	Ser	Pro	Xaa	Thr	Thr	Met
		35					40				45				
Thr	Ser	His	Pro	Ser	Ser	Pro	Lys	Cys	Gly	Val	Ser	Pro	Leu		
	50					55					60				

<210> 3053

<211> 2625

<212> DNA

<213> Homo sapiens

<400> 3053

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 120
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 180
 gttcttgatg agctcttgca gtatttgggt gttactagtc ctgaatgctt acagagaact
 240
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 300

gatgttatta atgctatcct taagcaacat acagaagaaa aagaatttgt tgagaagcac
360
tttaatgact taaacatgaa agctgtggaa caagatgaac caatacctca aaaacctcag
420
tcagcatttt attattgcag attgcttctt agtatattgg gaatgaattc ctgggacaaa
480
cggaggagct ttcattctcct gaagaaaaat gaaaagctac ttagagaact taggaacttg
540
gattcaaggc agtgccgaga gacacacaag attgcagtat tttatgttgc tgaaggacaa
600
gaagacaaac actccattct caccaatata ggaggaagtc aagcatatga agattttgta
660
gctggtcttg gttgggaggt aaatcttaca aaccattgtg gttttatggg aggactacaa
720
aaaaacaaaa gcactggatt gaccactcca tattttgcta cctctacagt agaggtaata
780
tttcacgtgt caacaagaat gccttctgat tctgatgatt ctttgaccaa aaaattgaga
840
catttgggaa atgatgaagt gcacattgtt tggtcagagc atactagaga ctacaggaga
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1080
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1140
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1200
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1260
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1320
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1380
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1440
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1560
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1620
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1680
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1860
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1920

aaacactcaa aataaatggt ctttagcatc tcaaattcca actgaaatca ttttagtatt
 1980
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 2040
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 2160
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 2220
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 2280
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 2340
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 2460
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 2520
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<210> 3054

<211> 417

<212> PRT

<213> Homo sapiens

<400> 3054

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Glu	Lys	Pro	Glu	Glu	Pro	Pro	Thr	Ser	Asn	Glu	Cys	Leu	Glu	Asp	Ile
		20						25					30		
Thr	Val	Lys	Asp	Gly	Leu	Ser	Leu	Gln	Phe	Lys	Arg	Phe	Arg	Glu	Thr
		35					40					45			
Val	Pro	Thr	Trp	Asp	Thr	Ile	Arg	Asp	Glu	Glu	Asp	Val	Leu	Asp	Glu
	50					55					60				
Leu	Leu	Gln	Tyr	Leu	Gly	Val	Thr	Ser	Pro	Glu	Cys	Leu	Gln	Arg	Thr
65				70						75				80	
Gly	Ile	Ser	Leu	Asn	Ile	Pro	Ala	Pro	Gln	Pro	Val	Cys	Ile	Ser	Glu
			85						90					95	
Lys	Gln	Glu	Asn	Asp	Val	Ile	Asn	Ala	Ile	Leu	Lys	Gln	His	Thr	Glu
		100						105					110		
Glu	Lys	Glu	Phe	Val	Glu	Lys	His	Phe	Asn	Asp	Leu	Asn	Met	Lys	Ala
	115						120					125			
Val	Glu	Gln	Asp	Glu	Pro	Ile	Pro	Gln	Lys	Pro	Gln	Ser	Ala	Phe	Tyr
	130					135					140				
Tyr	Cys	Arg	Leu	Leu	Leu	Ser	Ile	Leu	Gly	Met	Asn	Ser	Trp	Asp	Lys
145				150						155				160	
Arg	Arg	Ser	Phe	His	Leu	Leu	Lys	Lys	Asn	Glu	Lys	Leu	Leu	Arg	Glu
			165						170					175	
Leu	Arg	Asn	Leu	Asp	Ser	Arg	Gln	Cys	Arg	Glu	Thr	His	Lys	Ile	Ala

[illegible]

<210> 3055

<211> 905

<212> DNA

<213> Homo sapiens

<400> 3055

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 240
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 300
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 360
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 420
 gagcttgatt gggggcagtg gggccggctg ggagggcaca gccttactgc accatggcag
 480

ctacatcaag ctgggctgcc tgcagtttgt cttcagcatc actgagtttg cgaccaaaca
 540
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 660
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 720
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 780
 aaaccttttg actgtttttt aaaaatcctt tttcttttct caagttctag ggggcatttg
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 905

<210> 3056

<211> 195

<212> PRT

<213> Homo sapiens

<400> 3056

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Cys	Leu	Thr	Asn	Tyr	Gly	His	Cys	Asn	Tyr	Val	Ser	Gly	Lys	His	Ala
			20					25					30		
Cys	Ile	Phe	Tyr	Asp	Glu	Asn	Thr	Lys	His	Tyr	Glu	Leu	Leu	Asn	Tyr
		35					40					45			
Ser	Glu	His	Gly	Thr	Thr	Val	Asp	Asn	Val	Leu	Tyr	Ser	Cys	Asp	Phe
	50					55				60					
Ser	Glu	Lys	Thr	Pro	Pro	Thr	Pro	Pro	Ser	Ser	Ile	Val	Ala	Lys	Val
65					70					75				80	
Gln	Ser	Val	Ile	Arg	Arg	Arg	Arg	His	Gln	Lys	Gln	Asp	Glu	Glu	Pro
			85					90					95		
Ser	Glu	Glu	Ala	Ala	Met	Met	Ser	Ser	Gln	Ala	Gln	Gly	Pro	Gln	Arg
			100				105						110		
Arg	Pro	Cys	Asn	Cys	Lys	Ala	Ser	Ser	Ser	Ser	Leu	Ile	Gly	Gly	Ser
	115					120					125				
Gly	Ala	Gly	Trp	Glu	Gly	Thr	Ala	Leu	Leu	His	His	Gly	Ser	Tyr	Ile
	130					135				140					
Lys	Leu	Gly	Cys	Leu	Gln	Phe	Val	Phe	Ser	Ile	Thr	Glu	Phe	Ala	Thr
145					150					155				160	
Lys	Gln	Pro	Lys	Gly	Asp	Ala	Ser	Leu	Leu	Gln	Asp	Gly	Val	Leu	Ala
			165					170					175		
Glu	Lys	Leu	Ser	Leu	Lys	Pro	His	Gln	Gly	Pro	Val	Leu	Arg	Ser	Asn
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Ser	Val	Pro													
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<210> 3057

<211> 2169

<212> DNA

<213> Homo sapiens

<400> 3057

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120
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180
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300
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360
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420
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1260
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1560

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 1860
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 1980
 ttagaggggg cagctggaca agctcccaac tgcagagtcc cagccctggc tggggcaggg
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 ccccgccctg ggactcagca tttctgatat gccttaagaa ttcattctgt tttgtacaat
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 2169

<210> 3058

<211> 298

<212> PRT

<213> Homo sapiens

<400> 3058

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Ser	Val	Arg	Tyr	Cys	Ile	Lys	Ala	Thr	Leu	His	Arg	Pro	Trp	Val	Pro
		20						25					30		
Ala	Arg	Arg	Ala	Arg	Lys	Val	Phe	Thr	Val	Ile	Glu	Pro	Val	Asp	Ile
		35					40					45			
Asn	Thr	Pro	Ala	Leu	Leu	Ala	Pro	Gln	Ala	Gly	Ala	Arg	Glu	Lys	Val
	50				55					60					
Ala	Arg	Ser	Trp	Tyr	Cys	Asn	Arg	Gly	Leu	Val	Ser	Leu	Ser	Ala	Lys
65				70				75						80	
Ile	Asp	Arg	Lys	Gly	Tyr	Thr	Pro	Gly	Glu	Val	Ile	Pro	Val	Phe	Ala
		85						90					95		
Glu	Ile	Asp	Asn	Gly	Ser	Thr	Arg	Pro	Val	Leu	Pro	Arg	Ala	Ala	Val
		100					105					110			
Val	Gln	Thr	Gln	Thr	Phe	Met	Ala	Arg	Gly	Ala	Arg	Lys	Gln	Lys	Arg
	115					120					125				
Ala	Val	Val	Ala	Ser	Leu	Ala	Gly	Glu	Pro	Val	Gly	Pro	Gly	Gln	Arg
	130				135					140					
Ala	Leu	Trp	Gln	Gly	Arg	Ala	Leu	Arg	Ile	Pro	Pro	Val	Gly	Pro	Ser
145				150				155						160	
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		165					170					175			
Val	Asp	Ile	Pro	Gly	Thr	Ser	Lys	Leu	Leu	Leu	Glu	Leu	Pro	Leu	Val
	180						185					190			
Ile	Gly	Thr	Ile	Pro	Leu	His	Pro	Phe	Gly	Ser	Arg	Ser	Ser	Ser	Val

	195		200		205										
Gly	Ser	His	Ala	Ser	Phe	Leu	Leu	Asp	Trp	Arg	Leu	Gly	Ala	Leu	Pro
	210					215					220				
Glu	Arg	Pro	Glu	Ala	Pro	Pro	Glu	Tyr	Ser	Glu	Val	Val	Ala	Asp	Thr
225					230					235				240	
Glu	Glu	Ala	Ala	Leu	Gly	Gln	Ser	Pro	Phe	Pro	Leu	Pro	Gln	Asp	Pro
				245					250					255	
Asp	Met	Ser	Leu	Glu	Gly	Pro	Phe	Phe	Ala	Tyr	Ile	Gln	Glu	Phe	Arg
			260					265					270		
Tyr	Arg	Pro	Pro	Pro	Leu	Tyr	Ser	Glu	Glu	Asp	Pro	Asn	Pro	Leu	Leu
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Gly	Asp	Met	Arg	Pro	Arg	Cys	Met	Thr	Cys						
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<210> 3059

<211> 1411

<212> DNA

<213> Homo sapiens

<400> 3059

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180
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240
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720
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1020

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 1140
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<210> 3060

<211> 334

<212> PRT

<213> Homo sapiens

<400> 3060

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Lys	Lys	Lys	His	Arg	Arg	Arg	Ser	Ser	Ser	Ser	Ser	Ser	Ser	Asp	Ser	20	25	30	
Arg	Thr	Tyr	Ser	Arg	Lys	Lys	Gly	Gly	Arg	Lys	Ser	Arg	Ser	Lys	Ser	35	40	45	
Arg	Ser	Trp	Ser	Arg	Asp	Leu	Gln	Pro	Arg	Ser	His	Ser	Tyr	Asp	Arg	50	55	60	
Arg	Arg	Arg	His	Arg	Ser	Ser	Ser	Ser	Ser	Ser	Tyr	Gly	Ser	Arg	Arg	65	70	75	80
Lys	Arg	Ser	Arg	Ser	Arg	Ser	Arg	Gly	Arg	Gly	Lys	Ser	Tyr	Arg	Val	85	90	95	
Gln	Arg	Ser	Arg	Ser	Lys	Ser	Arg	Thr	Arg	Arg	Ser	Arg	Ser	Arg	Pro	100	105	110	
Arg	Leu	Arg	Ser	His	Ser	Arg	Ser	Ser	Glu	Arg	Ser	Ser	His	Arg	Arg	115	120	125	
Thr	Arg	Ser	Arg	Ser	Arg	Asp	Arg	Glu	Arg	Arg	Lys	Gly	Arg	Asp	Lys	130	135	140	
Glu	Lys	Arg	Glu	Lys	Glu	Lys	Asp	Lys	Gly	Lys	Asp	Lys	Glu	Leu	His	145	150	155	160
Asn	Ile	Lys	Arg	Gly	Glu	Ser	Gly	Asn	Ile	Lys	Ala	Gly	Leu	Glu	His	165	170	175	
Leu	Pro	Pro	Ala	Glu	Gln	Ala	Lys	Ala	Arg	Leu	Gln	Leu	Val	Leu	Glu	180	185	190	
Ala	Ala	Ala	Lys	Ala	Asp	Glu	Ala	Leu	Lys	Ala	Lys	Glu	Arg	Asn	Glu	195	200	205	
Glu	Glu	Ala	Lys	Arg	Arg	Lys	Glu	Glu	Asp	Gln	Ala	Thr	Leu	Val	Glu	210	215	220	
Gln	Val	Lys	Arg	Val	Lys	Glu	Ile	Glu	Ala	Ile	Glu	Ser	Asp	Ser	Phe	225	230	235	240
Val	Gln	Gln	Thr	Phe	Arg	Ser	Ser	Lys	Glu	Val	Lys	Lys	Ser	Val	Glu	245	250	255	
Pro	Ser	Glu	Val	Lys	Gln	Ala	Thr	Ser	Thr	Ser	Gly	Pro	Ala	Ser	Ala				

	260		265		270										
Val	Ala	Asp	Pro	Pro	Ser	Thr	Glu	Lys	Glu	Ile	Asp	Pro	Thr	Ser	Ile
	275						280				285				
Pro	Thr	Ala	Ile	Lys	Tyr	Gln	Asp	Asp	Asn	Ser	Leu	Ala	His	Pro	Asn
	290					295					300				
Leu	Phe	Ile	Glu	Lys	Ala	Asp	Ala	Glu	Glu	Lys	Trp	Phe	Lys	Arg	Leu
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<210> 3061

<211> 1554

<212> DNA

<213> Homo sapiens

<400> 3061

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180
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300
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1140

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<210> 3062

<211> 146

<212> PRT

<213> Homo sapiens

<400> 3062

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Phe	Lys	Met	Leu	Gln	Glu	Asn	Arg	Glu	Gly	Arg	Ala	Ala	Pro	Arg	Gln
			20					25					30		
Ser	Ser	Ser	Phe	Arg	Leu	Leu	Gln	Glu	Ala	Leu	Glu	Ala	Glu	Glu	Arg
		35					40					45			
Gly	Gly	Thr	Pro	Ala	Phe	Leu	Pro	Ser	Ser	Leu	Ser	Pro	Gln	Ser	Ser
	50					55				60					
Leu	Pro	Ala	Ser	Arg	Ala	Leu	Ala	Thr	Pro	Pro	Lys	Leu	His	Thr	Cys
65				70					75					80	
Glu	Lys	Cys	Ser	Thr	Ser	Ile	Ala	Asn	Gln	Ala	Val	Arg	Ile	Gln	Glu
			85					90					95		
Gly	Arg	Tyr	Arg	His	Pro	Gly	Cys	Tyr	Thr	Cys	Ala	Asp	Cys	Gly	Leu
			100				105						110		
Asn	Leu	Lys	Met	Arg	Gly	His	Phe	Trp	Val	Gly	Asp	Glu	Leu	Tyr	Cys
		115				120						125			
Glu	Lys	His	Ala	Arg	Gln	Arg	Tyr	Ser	Ala	Pro	Ala	Thr	Leu	Ser	Ser
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<210> 3063

<211> 386

<212> DNA

<213> Homo sapiens

<400> 3063

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 180

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 240
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<210> 3064
 <211> 128
 <212> PRT
 <213> Homo sapiens

<400> 3064
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 35 40 45
 Met Ile Val Ala Ala Phe Gln Cys Leu Cys Val Trp Leu Thr Glu His
 50 55 60
 Pro Asp Met Leu Asp Glu Lys Asp Tyr Leu Lys Glu Val Leu Glu Ile
 65 70 75 80
 Val Glu Leu Gly Ile Ser Gly Ser Lys Ser Lys Asn Asn Glu Gln Glu
 85 90 95
 Val Lys Tyr Lys Gly Asp Lys Glu Pro Asn Pro Ala Ser Met Arg Val
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<210> 3065
 <211> 2104
 <212> DNA
 <213> Homo sapiens

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 240
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 420
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2104

<210> 3066
<211> 183
<212> PRT
<213> Homo sapiens

<400> 3066
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35 40 45
Pro Val Gly Glu Glu Ser Ile Ser Asp Ala Glu Lys Val Ala Met Xaa
50 55 60
Ser Gln Gly Pro Xaa Thr Ala Pro Gly Ser Pro Cys Arg Ser Cys Gly
65 70 75 80
Thr Cys Cys Thr Arg Gly Thr Xaa Leu Lys Ser Lys Val Phe Leu Leu
85 90 95
Gln Glu Glu Leu Ala Tyr Tyr Lys Ser Glu Glu Met Glu Glu Glu Asn
100 105 110
Arg Ile Pro Gln Pro Pro Pro Ile Ala His Pro Arg Thr Ser Pro Gln
115 120 125
Pro Glu Ser Gly Ile Lys Arg Leu Phe Ser Phe Phe Ser Arg Asp Lys
130 135 140
Lys Arg Leu Ala Asn Thr Gln Arg Asn Val His Ile Gln Glu Ser Phe
145 150 155 160
Gly Gln Trp Ala Asn Thr His Arg Asp Asp Gly Tyr Thr Glu Gln Gly
165 170 175
Gln Glu Ala Leu Gln His Leu
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<210> 3067
<211> 645
<212> DNA
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<400> 3067
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420

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<210> 3068

<211> 204

<212> PRT

<213> Homo sapiens

<400> 3068

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Pro	Pro	Ala	Ala	Met	Ser	Gly	Ser	Pro	Ala	Pro	Lys	Ala	Gly	Tyr	Ala
		20						25				30			
Ser	Pro	Asn	Arg	Ala	Gln	Gly	Pro	Ser	Xaa	Val	Leu	Val	His	Gln	Ala
		35					40				45				
Arg	Glu	Pro	Thr	Ala	Gly	Ser	Pro	Pro	Cys	Ser	Leu	Pro	Arg	Pro	Asp
	50					55					60				
Leu	Gln	Pro	Pro	Ser	Thr	Pro	Pro	Pro	Pro	Val	His	Lys	Glu	Gln	Lys
65					70					75				80	
Lys	Ser	Asp	Pro	Pro	Pro	Pro	Pro	Pro	Gly	Lys	Phe	Lys	Ser	Phe	Leu
			85					90					95		
Pro	Pro	Arg	Ser	Pro	Gly	Asn	Ser	Ala	Leu	Gly	Pro	Arg	Arg	Gly	Trp
		100						105				110			
Gly	Trp	Ile	Ala	Ala	Gly	Gly	Ala	Pro	Ala	Met	Pro	Arg	Pro	Pro	Ser
	115						120					125			
Gly	Ala	Gly	Asp	Arg	Glu	Ile	Pro	Arg	Asp	Leu	Ala	Cys	Ala	Pro	Tyr
	130					135				140					
Pro	Pro	Pro	Gly	Ala	Gly	Arg	Gly	Ser	Glu	His	Arg	Ser	Ala	Pro	Gly
145					150				155					160	
Arg	Arg	Cys	Gly	Ser	Lys	Glu	Pro	Glu	Ala	Ala	Ala	Ser	Arg	Pro	Pro
			165					170					175		
Ser	Pro	Ala	Glu	Glu	Glu	Pro	Pro	Pro	Val	Ser	Ala	Glu	Glu	Thr	Pro
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Pro	Ser	Pro	Ala	Pro	Pro	Pro	Arg	Gly	Glu	Trp	Gly				
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<210> 3069

<211> 1561

<212> DNA

<213> Homo sapiens

<400> 3069

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 180

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420
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540
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720
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<210> 3070

<211> 153

<212> PRT

<213> Homo sapiens

<400> 3070

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 Tyr Phe Gln Val Leu Cys Val Ala Asp Val Val Ile Ser Thr Ala Lys
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 His Glu Phe Phe Gly Val Ala Met Leu Glu Ala Val Tyr Cys Gly Cys
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 Tyr Pro Leu Cys Pro Lys Asp Leu Val Tyr Pro Glu Ile Phe Pro Ala
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 Glu Tyr Leu Tyr Ser Thr Pro Glu Gln Leu Ser Lys Arg Leu Gln Asn
 100 105 110
 Phe Cys Lys Arg Pro Asp Ile Ile Arg Lys His Leu Tyr Lys Gly Glu
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<210> 3071

<211> 3343

<212> DNA

<213> Homo sapiens

<400> 3071

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<210> 3072

<211> 349

<212> PRT

<213> Homo sapiens

<400> 3072

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		20						25					30		
Lys	Glu	Ser	Arg	Gly	Leu	Arg	Gln	Gly	Thr	Ser	Val	Ala	Gln	Ser	
		35					40				45				
Gly	Ala	Gln	Ala	Pro	Gly	Arg	Ala	His	Arg	Cys	Ala	His	Cys	Arg	Arg
		50				55				60					
His	Phe	Pro	Gly	Trp	Val	Ala	Leu	Trp	Leu	His	Thr	Arg	Arg	Cys	Gln
65				70					75					80	
Ala	Arg	Leu	Pro	Leu	Pro	Cys	Pro	Glu	Cys	Gly	Arg	Arg	Phe	Arg	His
			85					90					95		
Ala	Pro	Phe	Leu	Ala	Leu	His	Arg	Gln	Val	His	Ala	Ala	Ala	Thr	Pro
			100					105					110		
Asp	Leu	Gly	Phe	Ala	Cys	His	Leu	Cys	Gly	Gln	Ser	Phe	Arg	Gly	Trp

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Val Ala Leu Val Leu His Leu Arg Ala His Ser Ala Ala Lys Arg Pro		
130	135	140
Ile Ala Cys Pro Lys Cys Glu Arg Arg Phe Trp Arg Arg Lys Gln Leu		
145	150	155
Arg Ala His Leu Arg Arg Cys His Pro Pro Ala Pro Glu Ala Arg Pro		
165	170	175
Phe Ile Cys Gly Asn Cys Gly Arg Ser Phe Ala Gln Trp Asp Gln Leu		
180	185	190
Val Ala His Lys Arg Val His Val Ala Glu Ala Leu Glu Glu Ala Ala		
195	200	205
Ala Lys Ala Leu Gly Pro Arg Pro Arg Gly Arg Pro Ala Val Thr Ala		
210	215	220
Pro Arg Pro Gly Gly Asp Ala Val Asp Arg Pro Phe Gln Cys Ala Cys		
225	230	235
Cys Gly Lys Arg Phe Arg His Lys Pro Asn Leu Ile Ala His Arg Arg		
245	250	255
Val His Thr Gly Glu Arg Pro His Gln Cys Pro Glu Cys Gly Lys Arg		
260	265	270
Phe Thr Asn Lys Pro Tyr Leu Thr Ser His Arg Arg Ile His Thr Gly		
275	280	285
Glu Lys Pro Tyr Pro Cys Lys Glu Cys Gly Arg Arg Phe Arg His Lys		
290	295	300
Pro Asn Leu Leu Ser His Ser Lys Ile His Xaa Ser Asp Pro Arg Gly		
305	310	315
Arg Pro Arg Pro Pro Pro Ala Arg Gly Ala Pro Ser Cys Gln Pro Ala		
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<210> 3073

<211> 791

<212> DNA

<213> Homo sapiens

<400> 3073

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<210> 3074

<211> 263

<212> PRT

<213> Homo sapiens

<400> 3074

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		20					25					30			
Ser	Cys	Glu	Phe	Leu	Leu	Ala	Gly	Ala	Gly	Gly	Ala	Gly	Ala	Gly	Ala
		35					40				45				
Ala	Pro	Gly	Pro	His	Leu	Pro	Pro	Arg	Gly	Ser	Val	Pro	Gly	Asp	Pro
	50					55					60				
Val	Arg	Ile	His	Cys	Asn	Ile	Thr	Glu	Ser	Tyr	Pro	Ala	Val	Pro	Pro
65				70					75					80	
Ile	Trp	Ser	Val	Glu	Ser	Asp	Asp	Pro	Asn	Leu	Ala	Ala	Val	Leu	Glu
			85					90					95		
Arg	Leu	Val	Asp	Ile	Lys	Lys	Gly	Asn	Thr	Leu	Leu	Leu	Gln	His	Leu
			100				105						110		
Lys	Arg	Ile	Ile	Ser	Asp	Leu	Cys	Lys	Leu	Tyr	Asn	Leu	Pro	Gln	His
		115				120					125				
Pro	Asp	Val	Glu	Met	Leu	Asp	Gln	Pro	Leu	Pro	Ala	Glu	Gln	Cys	Thr
		130				135					140				
Gln	Glu	Asp	Val	Ser	Ser	Glu	Asp	Glu	Asp	Glu	Glu	Met	Pro	Glu	Asp
145					150					155				160	
Thr	Glu	Asp	Leu	Asp	His	Tyr	Glu	Met	Lys	Glu	Glu	Glu	Pro	Ala	Glu
			165					170					175		
Gly	Lys	Lys	Ser	Glu	Asp	Asp	Gly	Ile	Gly	Lys	Glu	Asn	Leu	Ala	Ile
			180				185					190			
Leu	Glu	Lys	Ile	Lys	Lys	Asn	Gln	Arg	Gln	Asp	Tyr	Leu	Asn	Gly	Ala
		195				200					205				
Val	Ser	Gly	Ser	Val	Gln	Ala	Thr	Asp	Arg	Leu	Met	Lys	Glu	Leu	Gln
		210				215					220				
Gly	Tyr	Ile	Thr	Xaa	Ser	Gln	Ser	Phe	Lys	Gly	Gly	Asn	Tyr	Xaa	Ser
225					230					235				240	
Ser	Asn	Ser	Trp	Asn	Asp	Ser	Leu	Tyr	Gly	Trp	Asp	Val	Gln	Leu	Leu
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<210> 3075

<211> 603

<212> DNA

<213> Homo sapiens

<400> 3075

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<210> 3076

<211> 201

<212> PRT

<213> Homo sapiens

<400> 3076

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Val Gly Pro Gln Lys Lys Lys Lys Lys Lys Lys Val Leu Gly Gly
35          40          45
Gly Arg Phe Gly Gln Val His Arg Cys Thr Glu Lys Ser Thr Gly Leu
50          55          60
Ala Leu Ala Ala Lys Ile Ile Lys Val Lys Asn Val Lys Asp Arg Glu
65          70          75          80
Asp Val Lys Asn Glu Val Asn Ile Met Asn Gln Leu Ser His Val Asn
85          90          95
Leu Ile Gln Leu Tyr Asp Ala Phe Glu Ser Lys Ser Ser Phe Thr Leu
100         105         110
Ile Met Glu Tyr Val Asp Gly Gly Glu Leu Phe Asp Arg Ile Thr Asp
115         120         125
Glu Lys Tyr His Leu Thr Glu Leu Asp Val Val Leu Phe Thr Arg Gln
130         135         140
Ile Cys Glu Gly Val His Tyr Leu His Gln His Tyr Ile Leu His Leu
145         150         155         160
Asp Leu Lys Pro Glu Asn Ile Leu Cys Val Ser Gln Thr Gly His Gln

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				165					170					175	
Ile	Lys	Ile	Ile	Asp	Phe	Gly	Leu	Ala	Arg	Arg	Tyr	Lys	Pro	Arg	Glu
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Lys	Leu	Lys	Val	Asn	Phe	Gly	Thr	Pro							
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<210> 3077

<211> 1377

<212> DNA

<213> Homo sapiens

<400> 3077

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<210> 3078

<211> 310

<212> PRT

<213> Homo sapiens

<400> 3078

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			20					25					30		
Val	Gly	Ala	Leu	Pro	Arg	Gly	Pro	Arg	Gln	Asn	Ser	Arg	Leu	Gly	Leu
		35					40					45			
Pro	Leu	Leu	Leu	Met	Pro	Glu	Ala	Arg	Leu	Leu	Ala	Glu	Ile	Gly	
	50					55				60					
Ala	Val	Thr	Leu	Val	Ser	Ala	Pro	Arg	Pro	Asp	Ser	Arg	His	His	Ser
65					70					75					80
Leu	Ala	Leu	Thr	Ser	Phe	Lys	Arg	Gln	Gln	Glu	Glu	Ser	Phe	Gln	Glu
				85					90					95	
Gln	Ser	Ala	Leu	Ala	Ala	Glu	Ala	Arg	Glu	Thr	Arg	Arg	Gln	Glu	Leu
			100					105					110		
Leu	Glu	Lys	Ile	Thr	Glu	Gly	Gln	Ala	Ala	Lys	Lys	Gln	Lys	Leu	Glu
		115					120					125			
Gln	Ala	Ser	Gly	Ala	Ser	Ser	Ser	Gln	Glu	Ala	Gly	Ser	Ser	Gln	Ala
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145					150					155					160
Glu	Ala	Gly	Pro	Ser	Ser	Ser	Gln	Ala	Gly	Pro	Ser	Asn	Gly	Val	Ala
			165						170					175	
Pro	Leu	Pro	Arg	Ser	Ala	Leu	Leu	Val	Gln	Leu	Ala	Thr	Ala	Arg	Pro
			180					185					190		
Arg	Pro	Val	Lys	Ala	Arg	Pro	Leu	Asp	Trp	Arg	Val	Gln	Ser	Lys	Asp
		195					200					205			
Trp	Pro	His	Ala	Gly	Arg	Pro	Ala	His	Glu	Leu	Arg	Tyr	Ser	Ile	Tyr
	210					215					220				
Arg	Asp	Leu	Trp	Glu	Arg	Gly	Phe	Phe	Leu	Ser	Ala	Ala	Gly	Lys	Phe
225					230					235					240
Gly	Gly	Asp	Phe	Leu	Val	Tyr	Pro	Gly	Asp	Pro	Leu	Arg	Phe	His	Ala
			245						250					255	
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Asp	Leu	Val	Ala	Ala	Gly	Arg	Leu	Gly	Thr	Ser	Val	Arg	Lys	Thr	Leu
	275						280					285			
Leu	Leu	Cys	Ser	Pro	Gln	Pro	Asp	Gly	Lys	Val	Val	Tyr	Thr	Ser	Leu
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<210> 3079

<211> 1785

<212> DNA

<213> Homo sapiens

<400> 3079

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<210> 3080

<211> 500

<212> PRT

<213> Homo sapiens

<400> 3080

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Ile	Gly	Ile	Ile	Val	Gly	His	Ile	Gln	Ala	Ser	Val	Pro	Ala	Ser	Ser
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			260					265					270		
Thr	Gln	Asp	His	Gln	Lys	Leu	Cys	Tyr	Ser	Ala	Leu	Ile	Leu	Ala	Met
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Leu Ala Leu Asn Leu His Leu Pro Ala Ala Asp Gln Asn Val Ile Met				
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Glu Pro Gln Pro Pro His Ser Val Leu Lys Phe Leu Gln Asp Val Phe				
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Gly Ser Pro Ala Thr Ala Ala Ile Phe Tyr His Thr Asp Met Met Ala				
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Leu Ile Asp Ile Thr Val Arg His Ile Ala Asp Leu Ser Pro Gly Asp				
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Lys Gly Pro Phe Gly Ala Gly Gln Arg Pro Trp Pro Gly Val Pro Arg				
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Leu Leu Glu Pro Gly Ser Thr Pro Ser Arg Glu Pro His Pro Val Glu				
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Arg Ser Gly Val Pro Ala Leu Thr Ser Ser Trp Ala Ser Gly Cys Pro				
465		470		475
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<210> 3081

<211> 1902

<212> DNA

<213> Homo sapiens

<400> 3081

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<210> 3082

<211> 414

<212> PRT

<213> Homo sapiens

<400> 3082

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Val	Ser	Val	His	Lys	Phe	Val	Ala	Met	Trp	Arg	Lys	Ile	Leu	Gln	Asn		
35						40						45					
Cys	His	Asp	Asp	Ala	Ala	Lys	Phe	Val	His	Leu	Leu	Met	Ser	Pro	Gly		
50						55						60					
Cys	Asn	Tyr	Leu	Val	Gln	Glu	Asp	Phe	Val	Pro	Phe	Leu	Gln	Asp	Val		
65	70					75					80						
Val	Asn	Thr	His	Pro	Gly	Leu	Ser	Phe	Leu	Lys	Glu	Ala	Ser	Glu	Phe		
85						90						95					
His	Ser	Arg	Tyr	Ile	Thr	Thr	Val	Ile	Gln	Arg	Ile	Phe	Tyr	Ala	Val		
100						105						110					
Asn	Arg	Ser	Trp	Ser	Gly	Arg	Ile	Thr	Cys	Ala	Glu	Leu	Arg	Arg	Ser		
115						120						125					
Ser	Phe	Leu	Gln	Asn	Val	Ala	Leu	Leu	Glu	Glu	Glu	Ala	Asp	Ile	Asn		
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Gln	Leu	Thr	Glu	Phe	Phe	Ser	Tyr	Glu	His	Phe	Tyr	Val	Ile	Tyr	Cys		
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Lys	Phe	Trp	Glu	Leu	Asp	Thr	Asp	His	Asp	Leu	Leu	Ile	Asp	Ala	Asp		
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210						215						220					
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Phe	Gln	Asp	Cys	Leu	Cys	Gln	Met	Leu	Asp	Leu	Val	Lys	Pro	Arg	Thr		
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Gln	Lys	Glu	Gln	Ile	Ser	Leu	Leu	Arg	Asp	Gly	Asp	Ser	Gly	Gly	Pro		
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Ala	Gln	Arg	Pro	Phe	Phe	Glu	Ala	Pro	Ser	Pro	Leu	Gly	Ala	Val	Asp		
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<210> 3083

<211> 610

<212> DNA

<213> Homo sapiens

<400> 3083

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<210> 3084

<211> 144

<212> PRT

<213> Homo sapiens

<400> 3084

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			20					25					30		
Gln	Arg	Ser	Arg	Leu	His	Ala	Ala	Asp	Trp	Ala	Gly	Arg	Ala	Arg	Ala
			35					40				45			
Leu	Val	Gly	Asp	Ser	His	Thr	Ser	Trp	Ser	Pro	Ala	Ser	Ile	Pro	Gly
			50			55					60				
Lys	His	Tyr	Gln	Ala	Val	Gly	Leu	His	Leu	Trp	Lys	Val	Glu	Lys	Arg
65					70					75				80	
Arg	Val	Asn	Leu	Pro	Arg	Val	Leu	Ser	Met	Pro	Pro	Val	Ala	Gly	Thr
				85					90					95	
Ala	Cys	His	Ala	Tyr	Asp	Arg	Glu	Val	His	Leu	Arg	Cys	Glu	Leu	Ser
			100					105					110		
Pro	Gly	Tyr	Tyr	Leu	Ala	Val	Pro	Ser	Thr	Phe	Leu	Lys	Asp	Ala	Pro
			115					120					125		
Gly	Glu	Phe	Leu	Leu	Arg	Val	Phe	Ser	Thr	Gly	Arg	Val	Ser	Leu	Arg
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<210> 3085

<211> 1080

<212> DNA

<213> Homo sapiens

<400> 3085

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<210> 3086

<211> 58

<212> PRT

<213> Homo sapiens

<400> 3086

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<210> 3087

<211> 2329

<212> DNA

<213> Homo sapiens

<400> 3087

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<210> 3088

<211> 280

<212> PRT

<213> Homo sapiens

<400> 3088

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 Asp Asp Phe Asp Pro Gly Lys Lys Val Glu Val Glu Pro Pro Pro Asp
 35 40 45
 Arg Pro Val Arg Ala Cys Arg Thr Gln Gln Pro Glu Met Glu Arg Thr
 50 55 60
 His Ile Gln Gln Leu Leu Glu His Phe Leu Arg Gln Leu Gln Arg Lys
 65 70 75 80
 Asp Pro His Gly Phe Phe Ala Phe Pro Val Thr Asp Ala Ile Ala Pro
 85 90 95
 Gly Tyr Ser Met Ile Ile Lys His Pro Met Asp Phe Gly Thr Met Lys
 100 105 110
 Asp Lys Ile Val Ala Asn Glu Tyr Lys Ser Val Thr Glu Phe Lys Ala
 115 120 125
 Asp Phe Lys Leu Met Cys Asp Asn Ala Met Thr Tyr Asn Arg Pro Asp

130		135		140
Thr Val Tyr Tyr Lys	Leu Ala Lys Lys Ile Leu His Ala Gly Phe Lys			
145	150	155	160	
Met Met Ser Lys Gln Ala Ala Leu Leu Gly Asn Glu Asp Thr Ala Val				
	165	170	175	
Glu Glu Pro Val Pro Glu Val Val Pro Val Gln Val Glu Thr Ala Lys				
	180	185	190	
Lys Ser Lys Lys Pro Ser Arg Glu Val Ile Ser Cys Met Phe Glu Pro				
	195	200	205	
Glu Gly Asn Ala Cys Ser Leu Thr Asp Ser Thr Ala Glu Glu His Val				
	210	215	220	
Leu Ala Leu Val Glu His Ala Ala Asp Glu Ala Arg Asp Arg Ile Asn				
225	230	235	240	
Arg Phe Leu Pro Gly Gly Lys Met Gly Tyr Leu Lys Arg Asn Gly Asp				
	245	250	255	
Gly Ser Leu Leu Tyr Ser Val Val Asn Thr Ala Glu Pro Asn Ala Asp				
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<210> 3089

<211> 722

<212> DNA

<213> Homo sapiens

<400> 3089

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722

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<210> 3090

<211> 240

<212> PRT

<213> Homo sapiens

<400> 3090

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 35 40 45
 Gly Leu Ser Ser Pro Glu Phe Ser Glu Leu Cys Ile Trp Leu Gly Ser
 50 55 60
 Gln Ile Lys Ser Leu Cys Asn Leu Glu Glu Ser Ile Thr Ser Ala Gly
 65 70 75 80
 Arg Asp Asp Leu Glu Ser Phe Gln Leu Glu Ile Ser Gly Phe Leu Lys
 85 90 95
 Glu Met Ala Cys Pro Tyr Ser Val Leu Val Ser Gly Asp Ile Lys Glu
 100 105 110
 Arg Leu Thr Lys Lys Asp Asp Cys Leu Lys Leu Leu Leu Phe Leu Ser
 115 120 125
 Thr Glu Leu Gln Ala Leu Gln Ile Leu Gln Asn Lys Lys His Lys Asn
 130 135 140
 Ser Gln Leu Asp Lys Asn Ser Glu Val Tyr Gln Glu Val Gln Ala Met
 145 150 155 160
 Phe Asp Thr Leu Gly Ile Pro Lys Ser Thr Thr Ser Asp Ile Pro His
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 Met Leu Asn Gln Val Glu Ser Lys Val Lys Asp Ile Leu Ser Lys Val
 180 185 190
 Gln Lys Asn His Val Gly Lys Pro Leu Leu Lys Met Asp Leu Asn Ser
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<210> 3091

<211> 333

<212> DNA

<213> Homo sapiens

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 <213> Homo sapiens

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 Ser Arg Lys Arg Glu Pro Arg Asp Gly Val Lys Glu Trp Gly Ser Gln
 35 40 45
 Ala Phe Ser Asn His Phe Gly Thr Leu Gly Arg Arg Gly Arg Pro Gly
 50 55 60
 Gly Thr Lys Gly Leu Gly Cys Ser Leu Ser Val Pro Asp Pro Cys Gln
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 Ala Lys Met Val Trp Gln Arg Gly Glu Gln Leu Leu Pro Arg Ala Ser
 85 90 95
 Phe Pro Ser Ala Pro Phe Thr Arg
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<210> 3093
 <211> 720
 <212> DNA
 <213> Homo sapiens

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<211> 179
 <212> PRT
 <213> Homo sapiens

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 35 40 45
 Lys Thr Gln Thr Glu Tyr Gln Leu Ser Ser Pro Asp Gln Gln Asn Phe
 50 55 60
 Pro Asp Leu Glu Gly Gln Arg Leu Asn Cys Ser His Pro Glu Glu Gly
 65 70 75 80
 Arg Arg Leu Pro Thr Ala Arg Met Ile Ala Phe Ala Met Ala Leu Leu
 85 90 95
 Gly Cys Val Leu Ile Met Tyr Lys Ala Ile Trp Tyr Asp Gln Phe Thr
 100 105 110
 Cys Pro Asp Gly Phe Leu Leu Arg His Lys Ile Cys Thr Pro Leu Thr
 115 120 125
 Leu Glu Met Tyr Tyr Thr Glu Met Asp Pro Glu Arg His Arg Ser Ile
 130 135 140
 Leu Ala Ala Ile Gly Ala Tyr Pro Leu Ser Arg Lys His Gly Thr Glu
 145 150 155 160
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 165 170 175
 Lys Gly Pro

<210> 3095
 <211> 519
 <212> DNA
 <213> Homo sapiens

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<210> 3096

<211> 159

<212> PRT

<213> Homo sapiens

<400> 3096

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Pro Ser Lys Arg Pro Ser Lys Ile Gly Phe Asp Glu Val Phe Val Ile
          35           40           45
Ser Leu Ala Arg Arg Pro Asp Arg Arg Glu Arg Met Leu Ala Ser Leu
          50           55           60
Trp Glu Met Glu Ile Ser Gly Arg Val Val Asp Ala Val Asp Gly Trp
65           70           75           80
Met Leu Asn Ser Ser Ala Ile Arg Asn Leu Gly Val Asp Leu Leu Pro
          85           90           95
Gly Tyr Gln Asp Pro Tyr Ser Gly Arg Thr Leu Thr Lys Gly Glu Val
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Gly Cys Phe Leu Ser His Tyr Ser Ile Trp Glu Glu Arg Ala Val Gln
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<210> 3097

<211> 4953

<212> DNA

<213> Homo sapiens

<400> 3097

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<210> 3098

<211> 1359

<212> PRT

<213> Homo sapiens

<400> 3098

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Pro	Ala	Gly	Leu	Gly	Pro	Gly	Ala	Met	Ser	Gly	Gly	Gly	Gly	Gly	Gly

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				85					90					95
Asp	Thr	Glu	Thr	Gly	Leu	Glu	Pro	Asp	Glu	Leu	Ser	Ala	Leu	Cys
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Tyr	Ile	Gln	Ala	Ser	Lys	Ala	Arg	Asp	Gly	Ala	Ser	Pro	Phe	Ile
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Leu	Tyr	Val	Ser	Lys	Cys	Ile	Cys	Leu	Ile	Thr	Pro	Met	Ser	Phe
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Tyr	Glu	Val	Pro	Leu	Pro	Pro	Pro	Gly	Arg	Ser	Leu	Lys	Phe	Ser
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Val	Tyr	Trp	Pro	Ile	Ile	Cys	Gln	Arg	Pro	Ser	Thr	Asn	Glu	Leu
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Leu	Phe	Asp	Phe	Pro	Val	Lys	Glu	Val	Phe	Glu	Leu	Leu	Gly	Val
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Gln	Glu	Val	Ser	Glu	Ile	Leu	Met	Ala	Phe	Gly	Ile	Pro	Pro	Glu
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Glu	Glu	Leu	Arg	Ile	Tyr	Gln	Leu	Asn	Ile	Gln	Ile	Arg	Glu	Val	Phe
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Ala	Asn	Arg	Phe	Thr	Gln	Met	Phe	Ala	Asp	Tyr	Glu	Val	Phe	Val	Ile
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Gln	Pro	Ser	Gln	Asp	Lys	Glu	Ser	Trp	Phe	Thr	Asn	Arg	Glu	Gln	Met
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Gln	Asn	Phe	Asp	Lys	Ala	Ser	Phe	Leu	Ser	Asp	Gln	Pro	Glu	Pro	Tyr
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Leu	Pro	Phe	Leu	Ser	Arg	Phe	Leu	Glu	Thr	Gln	Met	Phe	Ala	Phe	Phe
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Ile	Asp	Asn	Lys	Ile	Met	Cys	His	Asp	Asp	Asp	Asp	Lys	Asp	Pro	Val
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Leu	Arg	Val	Phe	Asp	Ser	Arg	Val	Asp	Lys	Ile	Arg	Leu	Leu	Asn	Val
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Arg	Thr	Pro	Thr	Leu	Arg	Thr	Ser	Met	Tyr	Gln	Lys	Cys	Thr	Thr	Val
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Asp	Glu	Ala	Glu	Lys	Ala	Ile	Glu	Leu	Arg	Leu	Ala	Lys	Ile	Asp	His
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Thr	Ala	Ile	His	Pro	His	Leu	Leu	Asp	Met	Lys	Ile	Gly	Gln	Gly	Lys
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Tyr	Glu	Pro	Gly	Phe	Phe	Pro	Lys	Leu	Gln	Ser	Asp	Val	Leu	Cys	Thr
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Gly	Pro	Ala	Ser	Asn	Lys	Trp	Thr	Lys	Arg	Asn	Ala	Pro	Ala	Gln	Trp
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	770					775					780				
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Lys	Thr	Lys	Arg	Met	Leu	Val	Glu	Lys	Met	Gly	Arg	Glu	Ala	Val	Glu
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Leu	Gly	His	Gly	Glu	Val	Asn	Ile	Thr	Gly	Val	Glu	Glu	Asn	Thr	Leu
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Arg Leu Ser Met Glu Lys Lys Leu Leu Ser Arg His Leu Lys Gln Leu		
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Glu Cys Gln Asn Leu Gly Lys Leu Thr Thr Val Gln Ile Gly His Asp		
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Asn Ser Gly Leu Tyr Ala Lys Trp Leu Val Glu Tyr Val Met Val Arg		
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Tyr Glu Thr Leu Glu Lys Asn Glu Val Val Pro Glu Glu Asn Trp His		
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Pro Arg Asn Ile Gly Lys Asp Gly Lys Phe Gln Met Leu Val Cys Leu		
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Gly Ala Arg Asp His Leu Leu His His Trp Ile Ala Leu Leu Ala Asp		
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Cys Pro Ile Thr Ala His Met Tyr Glu Asp Val Ala Leu Ile Lys Asp		
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His Thr Leu Val Asn Ser Leu Ile Arg Val Leu Gln Thr Leu Gln Glu		
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<211> 1001

<212> DNA

<213> Homo sapiens

<400> 3099

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<211> 159

<212> PRT

<213> Homo sapiens

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35           40           45
Gly Lys Ile Met Cys Lys Ile Thr Ser Ala Leu Tyr Thr Leu Asn Phe

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	100	105
Gln Leu Val Phe Tyr Thr Val Asn Asp Asn Ala Arg Cys Ile Pro Ile		110
	115	120
Phe Pro Arg Tyr Leu Gly Thr Ser Met Lys Ala Leu Ile His Met Leu		125
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<211> 2623

<212> DNA

<213> Homo sapiens

<400> 3101

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 <212> PRT
 <213> Homo sapiens

<400> 3102

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			20					25					30		
Gln	Tyr	Ala	Gly	Pro	Gly	Leu	Ser	Leu	Gly	Ala	Pro	Gly	Gly	Arg	Ala
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Pro	Pro	Asp	Asp	Leu	Asp	Leu	Phe	Pro	Thr	Pro	Asp	Pro	His	Tyr	Glu
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Lys	Lys	Tyr	Tyr	Phe	Pro	Val	Arg	Glu	Leu	Glu	Arg	Ser	Leu	Arg	Phe
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Asp	Met	Lys	Gly	Asp	Asp	Val	Ile	Val	Phe	Leu	His	Ile	Gln	Lys	Thr
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Gly	Val	Leu	Asp	Arg	Arg	Asp	Ser	Ala	Ala	Leu	Arg	Thr	Pro	Arg	Lys
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Phe	Tyr	Tyr	Ile	Thr	Leu	Leu	Arg	Asp	Pro	Val	Ser	Arg	Tyr	Leu	Ser
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Glu	Trp	Arg	His	Val	Gln	Arg	Gly	Ala	Thr	Trp	Lys	Thr	Ser	Leu	His
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Pro	Tyr	Asn	Leu	Ala	Asn	Asn	Arg	Gln	Val	Arg	Met	Leu	Ala	Asp	Leu
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Ser	Leu	Val	Gly	Cys	Tyr	Asn	Leu	Ser	Phe	Ile	Pro	Glu	Gly	Lys	Arg
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Ala	Gln	Leu	Leu	Leu	Glu	Ser	Ala	Lys	Lys	Asn	Leu	Arg	Gly	Met	Ala
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Arg	Thr	Phe	Asn	Leu	Lys	Phe	Ile	Arg	Pro	Phe	Met	Gln	Tyr	Asn	Ser
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Thr	Arg	Ala	Gly	Gly	Val	Glu	Val	Asp	Glu	Asp	Thr	Ile	Arg	Arg	Ile
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Glu	Glu	Leu	Asn	Asp	Leu	Asp	Met	Gln	Leu	Tyr	Asp	Tyr	Ala	Lys	Asp
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Leu	Phe	Gln	Arg	Tyr	Gln	Tyr	Lys	Arg	Gln	Leu	Glu	Arg	Arg	Glu	
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Gln	Arg	Leu	Arg	Ser	Arg	Glu	Glu	Arg	Leu	Leu	His	Arg	Ala	Lys	Glu

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405	410	

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 <212> DNA
 <213> Homo sapiens

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 35 40 45
 Ala Ala Ala Trp Gln Arg Ala Ser Leu Gly Gln Trp Xaa Arg Arg Pro
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 Val Ala Ala Leu Ala Pro Tyr Ser Asp Ser Leu Val Glu Pro Leu Val
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 Cys Arg Leu Gln Val Leu Phe Leu Lys Lys Ala Gly Ser Glu Arg Pro
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 Cys Glu Thr Thr Pro Gly Ala Lys Gly Asp Ser His Lys Thr Gln Val
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 840
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 959

<210> 3110

<211> 207

<212> PRT

<213> Homo sapiens

<400> 3110

Met	Tyr	Lys	Arg	Gly	Leu	Val	Gln	Val	Trp	Ser	Leu	Glu	Gln	Pro	Glu
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Trp	His	Cys	Lys	Ile	Asp	Glu	Gly	Ser	Ala	Gly	Leu	Val	Ala	Ser	Cys
			20					25					30		
Trp	Ser	Pro	Asp	Gly	Arg	His	Ile	Leu	Asn	Thr	Thr	Glu	Phe	His	Leu
			35				40					45			
Arg	Ile	Thr	Val	Trp	Ser	Leu	Cys	Thr	Lys	Ser	Val	Ser	Tyr	Ile	Lys
	50					55					60				
Tyr	Pro	Lys	Ala	Cys	Leu	Gln	Gly	Ile	Thr	Phe	Thr	Arg	Asp	Gly	Arg
65					70					75				80	
Tyr	Met	Ala	Leu	Ala	Glu	Arg	Arg	Asp	Cys	Lys	Asp	Tyr	Val	Ser	Ile
				85					90					95	
Phe	Val	Cys	Ser	Asp	Trp	Gln	Leu	Leu	Arg	His	Phe	Asp	Thr	Asp	Thr
			100					105					110		
Gln	Asp	Leu	Thr	Gly	Ile	Glu	Trp	Ala	Pro	Asn	Gly	Cys	Val	Leu	Ala
			115				120					125			
Val	Trp	Asp	Thr	Cys	Leu	Glu	Tyr	Lys	Ile	Leu	Leu	Tyr	Ser	Leu	Asp
	130						135					140			
Gly	Arg	Leu	Leu	Ser	Thr	Tyr	Ser	Ala	Xaa	Arg	Val	Val	Xaa	Leu	Gly

145		150		155		160									
Ile	Lys	Ser	Val	Ala	Trp	Ser	Pro	Ser	Ser	Gln	Phe	Leu	Ala	Val	Gly
		165		170		175									
Ser	Tyr	Asp	Gly	Lys	Val	Arg	Ile	Leu	Asn	His	Val	Thr	Trp	Lys	Met
		180		185		190									
Ile	Thr	Glu	Phe	Gly	His	Pro	Cys	Ser	Pro	Ile	Asn	Asp	Ser	Gln	
		195		200		205									

<210> 3111

<211> 1269

<212> DNA

<213> Homo sapiens

<400> 3111

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120
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180
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240
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300
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360
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420
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480
cttcactcga caccatggct cagaggccac cgagaagcac gagtgactga cagctcctct
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gactcacact gatccaatac taactttctt ccctatttta cacatatatt tctactgtcc
660
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720
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780
tgcgtgtttc tacgtcacc tctgtatttt tagcttccag tttcctggta aggaataagt
840
tctccttccc agtcacactc ggggtcattt acacgtttct gggatgcct tgctcgtcca
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1080
tgctggactg tcgtcacacc tctgcgtct tcccagtct tccatggcct cccccggagc
1140
cccgtgtcc tggctccct tcttccctct gtcttggtca ggctccttcc cccatctctg
1200

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gtcatccac

1269

<210> 3112

<211> 151

<212> PRT

<213> Homo sapiens

<400> 3112

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Glu	Gly	Val	Arg	Met	Ser	Arg	Asp	Gly	Gly	Lys	Asp	Leu	Ala	Lys	Thr
		20					25					30			
Glu	Gly	Arg	Arg	Gly	Ala	Arg	Thr	Ala	Gly	Leu	Arg	Gly	Arg	Pro	Trp
		35				40					45				
Arg	Asp	Trp	Glu	Glu	Arg	Arg	Gly	Val	Thr	Thr	Val	Gln	His	Pro	Glu
	50					55					60				
Lys	Ser	Asp	Trp	Gln	Thr	Arg	Thr	Gly	Gln	Pro	Cys	Ser	Cys	Met	Ile
65				70					75					80	
Gln	Glu	Leu	Ala	Ser	Glu	Arg	Glu	Ser	Val	Ala	Glu	Ala	Gly	Gly	Ser
			85					90					95		
Ala	Arg	Gln	Lys	Val	Arg	Gly	Leu	Val	Leu	Arg	Arg	Gly	Lys	Arg	Gln
		100					105					110			
Ser	Glu	Ser	Leu	His	Ala	Pro	Gly	Leu	His	Gly	Arg	Ala	Arg	Ala	Ser
		115					120					125			
Gln	Lys	Arg	Val	Asn	Asp	Pro	Glu	Cys	Asp	Trp	Glu	Gly	Glu	Leu	Ile
	130					135					140				
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145					150										

<210> 3113

<211> 631

<212> DNA

<213> Homo sapiens

<400> 3113

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120
ccaaaaggga aggagatagt aagcctgctg gaaagaaaca tcaccgtgac aatgtacatc
180
accatcgga cccggaactt gcagaaatat gtgagccgca cttcggttgt gtttgtctcc
240
atctccttca ttgtcctgat gatcatttcc ctcgcatggc tcgtctttta ttacatccag
300
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360
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420
gattttgaca actgtgcagt ttgtattgaa gggtaacaagc ccaatgacgt tgtccggatc
480

ctgccctgcc ggcattcttt ccacaagtcc tgtgttgacc cctggcttct agaccatcgt
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<210> 3114

<211> 210

<212> PRT

<213> Homo sapiens

<400> 3114

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Ser	Asn	Thr	Asn	Glu	Thr	Ile	Thr	Met	Pro	His	Ala	Gly	Val	Glu	Asp
			20					25					30		
Ile	Val	Ala	Ile	Met	Ile	Pro	Glu	Pro	Lys	Gly	Lys	Glu	Ile	Val	Ser
		35					40					45			
Leu	Leu	Glu	Arg	Asn	Ile	Thr	Val	Thr	Met	Tyr	Ile	Thr	Ile	Gly	Thr
	50					55					60				
Arg	Asn	Leu	Gln	Lys	Tyr	Val	Ser	Arg	Thr	Ser	Val	Val	Phe	Val	Ser
65					70					75					80
Ile	Ser	Phe	Ile	Val	Leu	Met	Ile	Ile	Ser	Leu	Ala	Trp	Leu	Val	Phe
				85					90					95	
Tyr	Tyr	Ile	Gln	Arg	Phe	Arg	Tyr	Ala	Asn	Ala	Arg	Asp	Arg	Asn	Gln
			100					105					110		
Arg	Arg	Leu	Gly	Asp	Ala	Ala	Lys	Lys	Ala	Ile	Ser	Lys	Leu	Gln	Ile
		115					120					125			
Arg	Thr	Ile	Lys	Lys	Gly	Asp	Lys	Glu	Thr	Glu	Ser	Asp	Phe	Asp	Asn
	130					135					140				
Cys	Ala	Val	Cys	Ile	Glu	Gly	Tyr	Lys	Pro	Asn	Asp	Val	Val	Arg	Ile
145					150					155					160
Leu	Pro	Cys	Arg	His	Leu	Phe	His	Lys	Ser	Cys	Val	Asp	Pro	Trp	Leu
				165					170					175	
Leu	Asp	His	Arg	Thr	Cys	Pro	Met	Cys	Lys	Met	Asn	Ile	Leu	Lys	Ala
		180						185				190			
Leu	Gly	Ile	Pro	Pro	Asn	Ala	Asp	Cys	Met	Asp	Asp	Phe	Ala	Thr	Asp
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Phe	Glu														
	210														

<210> 3115

<211> 1366

<212> DNA

<213> Homo sapiens

<400> 3115

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 120
 gcagaaaaga tggaaaaaag gacatgtgca ctctgcccc aagatgtcga atataatgtc
 180

ctatactttg cacaatcaga gaatatagct gctcatgaga attgtttgct gtattcttca
 240
 ggacttgtgg aatgtgagga tcaggatcca cttaatcctg atagaagttt tgatgtggaa
 300
 tcagtaaaga aagaaatcca gagaggaagg aagttgaaat gcaaattttg tcataaaaga
 360
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 420
 aagaaggacg acgcagttcc acagtctgat ggagttcgag gaatttataa actgctttgc
 480
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 540
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 600
 tgtaatacat tcataagaca agtgaaagaa gagcatggca gacacacaga tgcaactgtg
 660
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 720
 aatattagac aaagttcatt caattccaga aaaactcatg gatgagacta cttcagaatc
 780
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 900
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 960
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 1020
 tcctaagcca agagtcatgt caaattgcaa tcagggtcaa aaccagagac caggctgtga
 1080
 aatccacaca tctttagaac tagtcgtctc ctcttggcct cagcagctct tccctgttct
 1140
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 1200
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 1366

<210> 3116

<211> 191

<212> PRT

<213> Homo sapiens

<400> 3116

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Val	Leu	Tyr	Phe	Ala	Gln	Ser	Glu	Asn	Ile	Ala	Ala	His	Glu	Asn	Cys
			20					25					30		
Leu	Leu	Tyr	Ser	Ser	Gly	Leu	Val	Glu	Cys	Glu	Asp	Gln	Asp	Pro	Leu
			35				40					45			
Asn	Pro	Asp	Arg	Ser	Phe	Asp	Val	Glu	Ser	Val	Lys	Lys	Glu	Ile	Gln

50	55	60
Arg Gly Arg Lys Leu Lys Cys Lys Phe Cys His Lys Arg Gly Ala Thr		
65	70	75
Val Gly Cys Asp Leu Lys Asn Cys Asn Lys Asn Tyr His Phe Phe Cys		80
	85	90
Ala Lys Lys Asp Asp Ala Val Pro Gln Ser Asp Gly Val Arg Gly Ile		95
	100	105
Tyr Lys Leu Leu Cys Gln Gln His Ala Gln Phe Pro Ile Ile Ala Gln		110
	115	120
Ser Gly Lys Phe Ser Gly Val Lys Arg Lys Arg Gly Arg Lys Lys Pro		125
	130	135
Leu Ser Gly Asn His Val Gln Pro Pro Glu Thr Met Lys Cys Asn Thr		140
145	150	155
Phe Ile Arg Gln Val Lys Glu Glu His Gly Arg His Thr Asp Ala Thr		160
	165	170
Val Lys Val Pro Phe Leu Lys Lys Cys Lys Xaa Ser Arg Thr Ser		175
	180	185
		190

<210> 3117

<211> 1373

<212> DNA

<213> Homo sapiens

<400> 3117

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120
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300
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420
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480
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540
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600
cgacccttg accttgggga gaaccagttg gagaccttg cacctgacct cctgaggggt
660
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720
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780
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840
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900

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cgggatggct tcgacatctc cggcaacccc tggatctgtg accagaacct gagcgacctc
 960
 tatcgttggc ttcaggccca aaaagacaag atgttttccc agaattgacac gcgctgtgct
 1020
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 1080
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 1200
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 1260
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 1373

<210> 3118

<211> 312

<212> PRT

<213> Homo sapiens

<400> 3118

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Ser	Ser	Ile	Ser	Cys	Gln	Pro	Pro	Ala	Glu	Ile	Pro	Gly	Tyr	Leu	Pro
			20					25					30		
Ala	Asp	Thr	Val	His	Leu	Ala	Val	Glu	Phe	Phe	Asn	Leu	Thr	His	Leu
		35					40					45			
Pro	Ala	Asn	Leu	Leu	Gln	Gly	Ala	Ser	Lys	Leu	Gln	Glu	Leu	His	Leu
		50				55						60			
Ser	Ser	Asn	Gly	Leu	Glu	Ser	Leu	Ser	Pro	Glu	Phe	Leu	Arg	Pro	Val
65					70					75				80	
Pro	Gln	Leu	Arg	Val	Leu	Asp	Leu	Thr	Arg	Asn	Ala	Leu	Thr	Gly	Leu
				85					90					95	
Pro	Pro	Gly	Leu	Phe	Gln	Ala	Ser	Ala	Thr	Leu	Asp	Thr	Leu	Val	Leu
			100					105					110		
Lys	Glu	Asn	Gln	Leu	Glu	Val	Leu	Glu	Val	Ser	Trp	Leu	His	Gly	Leu
		115					120					125			
Lys	Ala	Leu	Gly	His	Leu	Asp	Leu	Ser	Gly	Asn	Arg	Leu	Arg	Lys	Leu
		130				135					140				
Pro	Pro	Gly	Leu	Leu	Ala	Asn	Phe	Thr	Leu	Leu	Arg	Thr	Leu	Asp	Leu
145					150					155				160	
Gly	Glu	Asn	Gln	Leu	Glu	Thr	Leu	Pro	Pro	Asp	Leu	Leu	Arg	Gly	Pro
			165						170					175	
Leu	Gln	Leu	Glu	Arg	Leu	His	Leu	Glu	Gly	Asn	Lys	Leu	Gln	Val	Leu
			180					185					190		
Gly	Lys	Asp	Leu	Leu	Leu	Pro	Gln	Pro	Asp	Leu	Arg	Tyr	Leu	Phe	Leu
		195					200					205			
Ser	Gly	Asn	Lys	Leu	Ala	Arg	Val	Ala	Ala	Gly	Ala	Phe	Gln	Gly	Leu
		210				215					220				
Arg	Gln	Leu	Asp	Met	Leu	Asp	Leu	Ser	Asn	Asn	Ser	Leu	Ala	Ser	Val
225					230					235				240	
Pro	Glu	Gly	Leu	Trp	Ala	Ser	Leu	Gly	Gln	Pro	Asn	Trp	Asp	Met	Arg

	115		120		125
Leu	Asn Tyr Thr Ala Tyr Tyr Pro Ser Pro Glu Asp Asn Ala				
	130		135		140

<210> 3121
 <211> 284
 <212> DNA
 <213> Homo sapiens

<400> 3121
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 120
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 180
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 284

<210> 3122
 <211> 91
 <212> PRT
 <213> Homo sapiens

<400> 3122
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 Ser His Val Arg Arg Asn Lys Arg Asn Met Asn Leu Asp Gly Ala Ala
 35 40 45
 Ser Ile Val Pro Leu Leu Leu Leu Leu Met Asn Lys Ala Ser Pro Glu
 50 55 60
 Tyr Glu Glu Asn Met His Arg Tyr Gln Lys Ala Ala Lys Leu Phe Arg
 65 70 75 80
 Gly Arg Phe Ser Leu Phe Trp Trp Thr Val Val
 85 90

<210> 3123
 <211> 344
 <212> DNA
 <213> Homo sapiens

<400> 3123
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 120
 gcagcccagg tgaccttcag aaagacattg gagaagggaag caaagggaga ggagcccgac
 180
 atcgagtc ccaagttcaa acagaggaag ggggagtcac acggggccta tatccaccgc
 240

atgcagcaag aggccagca tgtgctgttc ctcagcaaga accaggccat ccggcagcca
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 344

<210> 3124
 <211> 92
 <212> PRT
 <213> Homo sapiens

<400> 3124
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 Lys Lys Ala Ala Gln Val Thr Phe Arg Lys Thr Leu Glu Lys Glu Ala
 20 25 30
 Lys Gly Glu Glu Pro Asp Ile Ala Val Pro Lys Phe Lys Gln Arg Lys
 35 40 45
 Gly Glu Ser Asp Gly Ala Tyr Ile His Arg Met Gln Gln Glu Ala Gln
 50 55 60
 His Val Leu Phe Leu Ser Lys Asn Gln Ala Ile Arg Gln Pro Glu Val
 65 70 75 80
 Gln Ala Ala Pro Lys Glu Lys Ser Glu Gln Lys Lys
 85 90

<210> 3125
 <211> 647
 <212> DNA
 <213> Homo sapiens

<400> 3125
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 120
 ggtcagcagg cagtttagtt gtgggagtat ttccaatttg catgaatgaa acatggacaa
 180
 ataagataag gctggctcca gggaagtaat tccccagtt cccctgagcc ttggatctgg
 240
 aaaactgcag cccatcctgg aattagggaa catcacaaaa cgtactgggg agaactcccc
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 atgtggcctc ggcccacgcc agaagccggg caagggtccca agtgccggct cgcccacaag
 360
 ctatggctaa gacagaaaaa caaaggaaaa aaagtcctcc ccaaacacac acataagcaa
 420
 aacccatctt cctgtgttct ctgccaaagag agctggagca aaagagatga gtttgagact
 480
 ctgattcatc catcaagaca aataaactca gtctatggag gttagcaggg caatttgtga
 540
 agcaaacaaa agttgagttt tggaaagggg ctctgaagaa aatgaagatg acataaccagg
 600
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<210> 3126

<211> 116

<212> PRT

<213> Homo sapiens

<400> 3126

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Phe Gln Asn Ser Thr Phe Val Cys Phe Thr Asn Cys Pro Ala Asn Leu
      20           25           30
His Arg Leu Ser Leu Phe Val Leu Met Asp Glu Ser Glu Ser Gln Thr
      35           40           45
His Leu Phe Cys Ser Ser Ser Leu Gly Arg Glu His Arg Lys Met Gly
      50           55           60
Phe Ala Tyr Val Cys Val Trp Gly Gly Leu Phe Phe Leu Cys Phe Ser
65           70           75           80
Val Leu Ala Ile Ala Cys Gly Arg Ala Gly Thr Trp Asp Leu Ala Arg
      85           90           95
Leu Leu Ala Trp Ala Glu Ala Thr Trp Gly Val Leu Pro Ser Thr Phe
      100           105           110
Cys Asp Val Pro
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<210> 3127

<211> 2218

<212> DNA

<213> Homo sapiens

<400> 3127

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<210> 3128

<211> 565

<212> PRT

<213> Homo sapiens

<400> 3128

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 Asp Ser Asp Gly Ser Val Lys Asp Lys Ile Thr Ala Phe Ile Val Glu
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<210> 3129
<211> 1964
<212> DNA
<213> Homo sapiens
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<210> 3130

<211> 273

<212> PRT

<213> Homo sapiens

<400> 3130

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Ala	Met	Glu	Phe	Ile	Ala	Ala	Thr	Glu	Val	Ala	Val	Ile	Gly	Phe	Phe
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Gln	Asp	Leu	Glu	Ile	Pro	Ala	Val	Pro	Ile	Leu	His	Ser	Met	Val	Gln

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<211> 283

<212> PRT

<213> Homo sapiens

<400> 3132

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Thr	Arg	Ser	Pro	Val	Ser	Pro	Leu	Ala	Ala	Gln	Gly	Ile	Pro	Leu	Pro
			35				40					45			
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			50			55					60				
His	Met	Tyr	Thr	Ser	Ser	Leu	Ala	Thr	Leu	Thr	Lys	Tyr	Pro	Glu	Ser
					70					75				80	
Arg	Ile	Gly	Arg	Leu	Phe	Asp	Gly	Thr	Glu	Pro	Ile	Val	Leu	Asp	Ser
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Leu	Lys	Gln	His	Tyr	Phe	Ile	Asp	Arg	Asp	Gly	Gln	Met	Phe	Arg	Tyr
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Ile	Leu	Asn	Phe	Leu	Arg	Thr	Ser	Lys	Leu	Leu	Ile	Pro	Asp	Asp	Phe

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Val Phe Pro Glu Ile Gly Asp Val Met Cys Asn Ser Val Asn Ala Gly		
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Trp Asn His Asp Ser Thr His Val Ile Arg Phe Pro Leu Asn Gly Tyr		
210	215	220
Cys His Leu Asn Ser Val Gln Val Leu Glu Arg Leu Gln Gln Arg Gly		
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Phe Glu Ile Val Gly Ser Cys Gly Gly Gly Val Asp Ser Ser Gln Phe		
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<210> 3133

<211> 621

<212> DNA

<213> Homo sapiens

<400> 3133

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<210> 3134

<211> 51

<212> PRT

<213> Homo sapiens

<400> 3134

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		20						25					30		
Thr	Glu	Val	Lys	Ser	Glu	Glu	Gly	Pro	Gly	Trp	Thr	Ile	Leu	Arg	Asp
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<210> 3135

<211> 3166

<212> DNA

<213> Homo sapiens

<400> 3135

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<210> 3136

<211> 278

<212> PRT

<213> Homo sapiens

<400> 3136

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			20					25					30		
Lys	Cys	Pro	Ile	Cys	Gln	Thr	Val	Lys	Ala	Asn	Gln	Leu	Glu	Leu	Glu
			35				40					45			
Thr	His	Thr	Arg	Glu	His	Arg	Leu	Gly	Asn	His	Tyr	Lys	Cys	Asp	Gln
			50			55					60				
Cys	Gly	Tyr	Leu	Ser	Lys	Thr	Ala	Asn	Lys	Leu	Ile	Glu	His	Val	Arg
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Val	His	Thr	Gly	Ser	Gly	Pro	Phe	His	Trp	Asp	Gln	Cys	Ser	Tyr	Ser
				85				90						95	
Cys	Lys	Arg	Lys	Asp	Asn	Leu	Asn	Leu	His	Lys	Lys	Leu	Lys	His	Ala
			100				105					110			
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Val	Leu	Leu	Asp	Leu	Glu	Pro	Arg	Val	Ile	His	Ser	Ile	Leu	Asn	Ser
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Pro	Tyr	Ala	Lys	Leu	Tyr	Asn	Pro	Glu	Asn	Ile	Tyr	Leu	Ser	Glu	His
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Gly	Gly	Gly	Ala	Gly	Asn	Asn	Trp	Ala	Ser	Gly	Phe	Ser	Gln	Gly	Glu
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Lys	Ile	His	Glu	Asp	Ile	Phe	Asp	Ile	Ile	Asp	Arg	Glu	Ala	Asp	Gly
		115					120					125			
Ser	Asp	Ser	Leu	Glu	Gly	Phe	Val	Leu	Cys	His	Ser	Ile	Ala	Gly	Gly
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Thr	Gly	Ser	Gly	Leu	Gly	Ser	Tyr	Leu	Leu	Glu	Arg	Leu	Asn	Asp	Arg
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Tyr	Pro	Lys	Lys	Leu	Val	Gln	Thr	Tyr	Ser	Val	Phe	Pro	Asn	Gln	Asp
			165					170						175	
Glu	Met	Ser	Asp	Val	Val	Val	Gln	Pro	Tyr	Asn	Ser	Leu	Leu	Thr	Leu
			180				185					190			
Lys	Arg	Leu	Thr	Gln	Asn	Ala	Asp	Cys	Val	Val	Val	Leu	Asp	Asn	Thr

195	200	205
Ala Leu Asn Arg Ile Ala Thr Asp Arg Leu His Ile Gln Asn Pro Ser		
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Phe Ser Gln Ile Asn Gln Leu Val Ser Thr Ile Met Ser Ala Ser Thr		
225	230	235
Thr Thr Leu Arg Tyr Pro Gly Tyr Met Asn Asn Asp Leu Ile Gly Leu		
245	250	255
Ile Ala Ser Leu Ile Pro Thr Pro Arg Leu His Phe Leu Met Thr Gly		
260	265	270
Tyr Thr Pro Leu Thr Thr Asp Gln Ser Val Ala Ser Val Arg Lys Thr		
275	280	285
Thr Val Leu Asp Val Met Arg Arg Leu Leu Gln Pro Lys Asn Val Met		
290	295	300
Val Ser Thr Gly Arg Asp Arg Gln Thr Asn His Cys Tyr Ile Ala Ile		
305	310	315
Leu Asn Ile Ile Gln Gly Glu Val Asp Pro Thr Gln Val His Lys Ser		
325	330	335
Leu Gln Arg Ile Arg Glu Arg Lys Leu Ala Asn Phe Ile Pro Trp Gly		
340	345	350
Pro Ala Ser Ile Gln Val Ala Leu Ser Arg Lys Ser Pro Tyr Leu Pro		
355	360	365
Ser Ala His Arg Val Ser Gly Leu Met Met Ala Asn His Thr Ser Ile		
370	375	380
Ser Ser Leu Phe Glu Arg Thr Cys Arg Gln Tyr Asp Lys Leu Arg Lys		
385	390	395
Arg Glu Ala Phe Leu Glu Gln Phe Arg Lys Glu Asp Met Phe Lys Asp		
405	410	415
Asn Phe Asp Glu Met Asp Thr Ser Arg Glu Ile Val Gln Gln Leu Ile		
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Gln Glu Gln		
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<210> 3143

<211> 356

<212> DNA

<213> Homo sapiens

<400> 3143

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<210> 3144

<211> 81
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 <213> Homo sapiens

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 35 40 45
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 Pro His His Ser Gln Thr Pro Pro Gln Arg Val Cys Leu Arg Ala Pro
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 Ser

<210> 3145
 <211> 436
 <212> DNA
 <213> Homo sapiens

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<210> 3146
 <211> 131
 <212> PRT
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<400> 3146
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 35 40 45
 Arg Leu Pro Pro Phe Thr His Leu Pro Ser Val Pro Gly Pro Pro Ser

50		55		60											
Leu	Val	Cys	Gln	Thr	Leu	Gln	Pro	Pro	Ala	Ser	Gly	His	Ser	Ala	Arg
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Gln	Met	Thr	Ser	Gly	Gly	Glu	Pro	His	Ile	Ser	Thr	Gly	Ser	Arg	Arg
				85						90					95
Pro	Arg	Lys	Leu	Pro	Trp	Pro	Ala	His	Pro	Arg	Cys	Ser	Ala	Cys	Pro
			100					105					110		
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<210> 3147

<211> 3106

<212> DNA

<213> Homo sapiens

<400> 3147

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<210> 3148

<211> 444

<212> PRT

<213> Homo sapiens

<400> 3148

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Thr	Asp	Arg	Trp	Leu	Val	Ile	Asp	Arg	Lys	Val	Tyr	Asn	Ile	Thr	Lys	35	40	45	
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Gly	Glu	Asp	Ala	Thr	Asp	Ala	Phe	Arg	Ala	Phe	His	Pro	Asp	Leu	Glu	65	70	75	80
Phe	Val	Gly	Lys	Phe	Leu	Lys	Pro	Leu	Leu	Ile	Gly	Glu	Leu	Ala	Pro	85	90	95	
Glu	Glu	Pro	Ser	Gln	Asp	His	Gly	Lys	Asn	Ser	Lys	Ile	Thr	Glu	Asp	100	105	110	
Phe	Arg	Ala	Leu	Arg	Lys	Thr	Ala	Glu	Asp	Met	Asn	Leu	Phe	Lys	Thr	115	120	125	
Asn	His	Val	Phe	Phe	Leu	Leu	Leu	Ala	His	Ile	Ile	Ala	Leu	Glu		130	135	140	
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Thr	Leu	Ile	Thr	Ala	Phe	Val	Leu	Ala	Thr	Ser	Gln	Ala	Gln	Ala	Gly	165	170	175	
Trp	Leu	Gln	His	Asp	Tyr	Gly	His	Leu	Ser	Val	Tyr	Arg	Lys	Pro	Lys	180	185	190	
Trp	Asn	His	Leu	Val	His	Lys	Phe	Val	Ile	Gly	His	Leu	Lys	Gly	Ala	195	200	205	
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Leu	Gly	Glu	Trp	Gln	Pro	Ile	Glu	Tyr	Gly	Lys	Lys	Lys	Leu	Lys	Tyr	245	250	255	
Leu	Pro	Tyr	Asn	His	Gln	His	Glu	Tyr	Phe	Phe	Leu	Ile	Gly	Pro	Pro				

	260		265		270										
Leu	Leu	Ile	Pro	Met	Tyr	Phe	Gln	Tyr	Gln	Ile	Ile	Met	Thr	Met	Ile
	275		280		285										
Val	His	Lys	Asn	Trp	Val	Asp	Leu	Ala	Trp	Ala	Val	Ser	Tyr	Tyr	Ile
	290		295		300										
Arg	Phe	Phe	Ile	Thr	Tyr	Ile	Pro	Phe	Tyr	Gly	Ile	Leu	Gly	Ala	Leu
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			325		330										335
Val	Thr	Gln	Met	Asn	His	Ile	Val	Met	Glu	Ile	Asp	Gln	Glu	Ala	Tyr
	340		345		350										
Arg	Asp	Trp	Phe	Ser	Ser	Gln	Leu	Thr	Ala	Thr	Cys	Asn	Val	Glu	Gln
	355		360		365										
Ser	Phe	Phe	Asn	Asp	Trp	Phe	Ser	Gly	His	Leu	Asn	Phe	Gln	Ile	Glu
	370		375		380										
His	His	Leu	Phe	Pro	Thr	Met	Pro	Arg	His	Asn	Leu	His	Lys	Ile	Ala
385			390		395										400
Pro	Leu	Val	Lys	Ser	Leu	Cys	Ala	Lys	His	Gly	Ile	Glu	Tyr	Gln	Glu
			405		410										415
Lys	Pro	Leu	Leu	Arg	Ala	Leu	Leu	Asp	Ile	Ile	Arg	Ser	Leu	Lys	Lys
	420		425		430										
Ser	Gly	Lys	Leu	Trp	Leu	Asp	Ala	Tyr	Leu	His	Lys				
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<210> 3149

<211> 1006

<212> DNA

<213> Homo sapiens

<400> 3149

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<211> 201

<212> PRT

<213> Homo sapiens

<400> 3150

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Arg	Ser	Lys	Ile	Val	Arg	Ala	Phe	Phe	Asp	Asn	Arg	Asn	Leu	Arg	Lys
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<212> DNA

<213> Homo sapiens

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2079

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<210> 3152
<211> 214
<212> PRT
<213> Homo sapiens
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<400> 3152
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Phe Lys Gln Cys Leu Asp Glu Lys Glu Glu Val Leu Leu Asp Pro Tyr
          20          25          30
Ile Ala Ser Trp Lys Gly Leu Val Arg Phe Leu Asn Ser Leu Gly Thr
          35          40          45
Ile Phe Ser Phe Ile Ser Lys Asp Val Val Ser Lys Leu Arg Ile Met
          50          55          60
Glu Arg Leu Arg Gly Gly Pro Gln Ser Glu His Tyr Arg Ser Leu Gln
65          70          75          80
Ala Met Val Ala His Glu Leu Ser Asn Arg Leu Val Asp Leu Glu Gly
          85          90          95
Arg Ser His His Pro Glu Ser Gly Cys Arg Thr Val Leu Arg Leu His
          100          105          110
Arg Ala Leu His Trp Leu Gln Leu Phe Leu Glu Gly Leu Arg Thr Ser
          115          120          125
Pro Glu Asp Ala Arg Thr Ser Ala Leu Cys Ala Asp Ser Tyr Asn Ala
          130          135          140
Ser Leu Ala Ala Tyr His Pro Trp Val Val Arg Arg Ala Val Thr Val
145          150          155          160
Ala Phe Cys Thr Leu Pro Thr Arg Glu Val Phe Leu Glu Ala Met Asn
          165          170          175
Val Gly Pro Pro Glu Gln Ala Val Gln Met Leu Gly Glu Ala Leu Pro
          180          185          190
Phe Ile Gln Arg Val Tyr Asn Val Ser Gln Lys Leu Tyr Ala Glu His
          195          200          205
Ser Leu Leu Asp Leu Pro
          210

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<210> 3153
<211> 1498
<212> DNA
<213> Homo sapiens
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<400> 3153

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120
cccactcagc aaccaacaag gaggaagacc cccgcagtgc tcggccagtg ccgcgccatc
180
gccaccaggg agcgccccgc ggcgggtcca cgtggcagag gtcgcggcct cgcgggcgcg
240
ggaggagccg cacgccacag tggcagggtcc caggccgtca ctccgagctc tcgccttccg
300
ggccgctgtc cggcgtgggc gggaggaggg gtctccggcg cgagcgcttg acccgggcgcg
360
agggtgcag cagcctccgc ttcagcacag cagccactgt gtcttggtg tccgctgtgg
420
gccccagta gatgctctcc ccgcgtcggg agtttctgtg cagccgtgtg cagagcgtgg
480
ccagggtgag cagcaccagc aggaagggtca gggccatggc agcccaggcg gcctcttcag
540
tgcgtggggg ggggccccgg gctgcccgtg gagcgctgct gcgcgagggg ccggggaagc
600
ctgacttgaa cagacacagc cccctgggct gccttgcccc ttgggcacct gagcctctgt
660
cctggagctg gcattgcctc caggcgcccc cggcagcagg gagacagtgg gcacagatgg
720
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780
ggaagcagag ggaaacctca gggctgagcg agtgggctgg ggaccaaggg cagcccgcag
840
cctccgcctc ttggcaccac tagaagaggg ctgcctgggc ccttgagatg tcacctctgt
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960
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1020
ttcacagtag atccatgcct tcttcttctc ctgcttctc ctccgcctcc tcatcagcca
1080
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1140
caccaggggc cgatcctgcg tgaggctgaa gtcaggggtg aggggaagggt tagccataca
1200
agcataggcc aggagggcaa gctggagctt cagccaggga tgggcacagg ggtggtagag
1260
gaaggtgaca tcctcagcct gccctgggct cactcgtgtg taggtcactc ttggtgacac
1320
ctgcggaggc agaggccaca ggctctcggg acaatgggct cccgcctcct ccgcgggtcc
1380
agccatcacc tgtgggtcca aagcgaagag ttggggcgct ggacgcggcg aggccttgc
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<210> 3154

<211> 65

<212> PRT

<213> Homo sapiens

<400> 3154

Thr Asp Thr Ala Pro Trp Ala Ala Leu Pro Val Gly His Leu Ser Leu
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 Cys Pro Gly Ala Gly Ile Ala Ser Arg Arg Pro Arg Gln Gln Gly Asp
 20 25 30
 Ser Gly His Arg Trp Gly Ile Thr Leu Pro Thr Arg Asp Ser Arg His
 35 40 45
 Gly Leu Leu Gly Leu Gln Ala Pro Trp Gly Ser Arg Gly Lys Pro Gln
 50 55 60
 Gly
 65

<210> 3155

<211> 551

<212> DNA

<213> Homo sapiens

<400> 3155

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 120
 actaactgtg actcttcttc agaaggactg gaaaaggaca cagcaacaca gagaagtgc
 180
 cagacttgcc tagaaccatc atgttcatgt tcttctgaaa atcaggaatg ccagactgct
 240
 gccagccctg gggaaattct ggaaattttg aagaaagga aggcatttgt tttagatatt
 300
 gacttggatt ttttttcagt caagaatccc ttcaaaaaaa tgttcactca ggaagagtac
 360
 aaaatcttac aagagctgta ccaatttaag aaacctggca ccaacctaac agaggaagat
 420
 ttggtagata ttgttgatac tcgaattcat caattagagg atttagaagc cactttcgct
 480
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 540
 gaatcactag t
 551

<210> 3156

<211> 178

<212> PRT

<213> Homo sapiens

<400> 3156

Met Val Lys Pro Tyr Lys Leu Cys Asn Asn Gln Glu Glu Asn Asp Ala
 1 5 10 15
 Val Ser Ser Ala Lys Lys Pro Lys Leu Ala Leu Glu Asp Ser Glu Asn
 20 25 30
 Thr Ala Ser Thr Asn Cys Asp Ser Ser Ser Glu Gly Leu Glu Lys Asp
 35 40 45
 Thr Ala Thr Gln Arg Ser Asp Gln Thr Cys Leu Glu Pro Ser Cys Ser

50		55		60
Cys Ser Ser Glu Asn Gln Glu Cys Gln Thr Ala Ala Ser Pro Gly Glu				
65		70		75
Ile Leu Glu Ile Leu Lys Lys Gly Lys Ala Phe Val Leu Asp Ile Asp				
	85		90	
Leu Asp Phe Phe Ser Val Lys Asn Pro Phe Lys Lys Met Phe Thr Gln				
	100		105	
Glu Glu Tyr Lys Ile Leu Gln Glu Leu Tyr Gln Phe Lys Lys Pro Gly				
	115		120	
Thr Asn Leu Thr Glu Glu Asp Leu Val Asp Ile Val Asp Thr Arg Ile				
	130		135	
His Gln Leu Glu Asp Leu Glu Ala Thr Phe Ala Asp Leu Cys Asp Gly				
145		150		155
Asp Asp Glu Glu Thr Val Gln Gly Trp Ala Ser Asn Pro Gly Met Glu				
	165		170	
Ser Leu				

<210> 3157

<211> 903

<212> DNA

<213> Homo sapiens

<400> 3157

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120
tctctggtag gacttctgat ggtgggggca cctccccagg tcacagtcca ggtgcagggc
180
caggaggtcc tatcagagaa gatggagccc tccagtttcc agcccctacc tgaaactgag
240
cctccaactc cagagcctgg gcccaagaca cctcctagga ctatgcagga atcaccactg
300
ggcctgcagg tgaaagagga gtcagagggt acagaggact cagatttcct ggagtctggg
360
cctctagctg ccaccagga gtctgtaccc accctcctgc ctgaggaggc ccagtgacca
420
ctgtgatttc agagatgtgg gaccgtgctg gaccagatct tccccacag caagactggg
480
cctgagggtc cctcatggag ggagcacccc agggccctgt ggcatgagga agctgggggc
540
atcttctccc cagggttcgc gctgcagcta ggcagcatct ccgcagggtcc aggtagtgtg
600
agccctcacc tccacgtccc ctgggacctc ggcattggctg gcctttctgg ccagatccaa
660
tcaccctccc gcgaagggtg ctttgcgcat gcgcttctgc tccccagcga tctgaggagt
720
gaacaggacc ccacggacga ggatccctgc cgggggtgtg gccctgctct ggtcaccacc
780
cgctggcgct cccccagggg ccggagccgg ggccgcccc gactggggg cgggggtggtt
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900

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cac
903

<210> 3158
<211> 92
<212> PRT
<213> Homo sapiens

<400> 3158
Met Val Gly Ala Pro Pro Gln Val Thr Val Gln Val Gln Gly Gln Glu
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Val Leu Ser Glu Lys Met Glu Pro Ser Ser Phe Gln Pro Leu Pro Glu
20 25 30
Thr Glu Pro Pro Thr Pro Glu Pro Gly Pro Lys Thr Pro Pro Arg Thr
35 40 45
Met Gln Glu Ser Pro Leu Gly Leu Gln Val Lys Glu Glu Ser Glu Val
50 55 60
Thr Glu Asp Ser Asp Phe Leu Glu Ser Gly Pro Leu Ala Ala Thr Gln
65 70 75 80
Glu Ser Val Pro Thr Leu Leu Pro Glu Glu Ala Gln
85 90

<210> 3159
<211> 2408
<212> DNA
<213> Homo sapiens

<400> 3159
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120
ccctggcaga ctaacgaagc agctcccttc ccaccccaac tgcaggtcta attttggacg
180
ctttgcctgc catttcttcc aggttgaggg agccgcagag gcgagggtc gcgtattcct
240
gcagtcagca cccacgtgc ccccggaacg tcggtgctca ggccttcgc gagcggggct
300
ctccgtctgc ggtcccttgt gaaggctctg ggcggtgca gaggccggcc gtccggtttg
360
gtcacctct cccaggaaac ttcacactgg agagccaaaa ggagtgaag agcctgtctt
420
ggagattttc ctggggaaat cctgagggtca ttcattatga agtgtagcgc gcgggagtgg
480
ctcagagtaa ccacagtgc gttcatggct agagcaattc cagccatggg ggttccaat
540
gccactttat tggagaaact tttggaaaaa tacatggatg aggatgggtga gtggtggata
600
gccaaacaac gagggaaaag ggccatcaca gacaatgaca tgcagagtat tttggacctt
660
cataataaat tacgaagtca ggtgtatcca acagcctcta atatggagta tatgacatgg
720
gatgtagagc tggaaagatc tgcagaatcc tgggctgaaa gttgcttggt ggaacatgga
780

cctgcaagct tgcttccatc aattggacag aatttgggag cacactgggg aagatatagg
840
cccccgacgt ttcatgtaca atcgtggtat gatgaagtga aagacttttag ctacccatat
900
gaacatgaat gcaaccata ttgtccattc aggtgttctg gccctgtatg tacacattat
960
acacagggtcg tgtgggcaac tagtaacaga atcgggttggtg ccattaattt gtgtcataac
1020
atgaacatct gggggcagat atggcccaa gctgtctacc tgggtgtgcaa ttactcccca
1080
aagggaaact ggtggggcca tgccccttac aaacatgggc ggccctgttc tgcttgccca
1140
cctagttttg gagggggctg tagagaaaat ctgtgctaca aagaagggtc agacagggtat
1200
tatccccctc gagaagagga aacaaatgaa atagaacgac agcagtcaca agtccatgac
1260
acccatgtcc ggacaagatc agatgatagt agcagaaatg aagtcataag cgcacagcaa
1320
atgtcccaaa ttgtttcttg tgaagtaaga ttaagagatc agtgcaaagg aacaacctgc
1380
aataggtagc aatgtcctgc tggctgtttg gatagtaaag ctaaagttat tggcagtgta
1440
cattatgaaa tgcaatccag catctgtaga gctgcaattc attatggtat aatagacaat
1500
gatggtggct gggtagatat cactagacaa ggaagaaagc attatttcat caagtccaat
1560
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1620
gtaacagttc aggctgtgac ttgtgaaaca actgtggaca gctctgtcca ttccataagc
1680
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1740
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1800
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1860
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1920
ccaggaggaa aggcattcag agtggttgct gttgtgtgaa actgaatact tggaagagga
1980
ccataaagac tattccaaat gcaatatttc tgaattttgt ataaaactgt aacattactg
2040
tacagagtac atcaactatt ttcagcccaa aaaggtgcca aatgcatata aatcttgata
2100
aacaagtct ataaaataaa acatgggaca ttagcttttg gaaaagtaat gaaaatataa
2160
tggttttaga aatcctgtgt taaatattgc tatattttct tagcagttat ttctacagtt
2220
aattacatag tcatgattgt tctacgttcc atatattata tgggtgcttg tatatgccac
2280
taataaaatg aatctaaaca ttgaatgtga atggccctca gaaaatcatc tagtgcattt
2340
aaaaataatc gactctaaaa ctgaaagaaa ccttatcaca ttttccccag ttcaatgcta
2400

tgccatta

2408

<210> 3160

<211> 431

<212> PRT

<213> Homo sapiens

<400> 3160

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Met	Ala	Arg	Ala	Ile	Pro	Ala	Met	Val	Val	Pro	Asn	Ala	Thr	Leu	Leu
			20					25					30		
Glu	Lys	Leu	Leu	Glu	Lys	Tyr	Met	Asp	Glu	Asp	Gly	Glu	Trp	Trp	Ile
		35					40					45			
Ala	Lys	Gln	Arg	Gly	Lys	Arg	Ala	Ile	Thr	Asp	Asn	Asp	Met	Gln	Ser
	50					55					60				
Ile	Leu	Asp	Leu	His	Asn	Lys	Leu	Arg	Ser	Gln	Val	Tyr	Pro	Thr	Ala
65					70					75					80
Ser	Asn	Met	Glu	Tyr	Met	Thr	Trp	Asp	Val	Glu	Leu	Glu	Arg	Ser	Ala
				85					90					95	
Glu	Ser	Trp	Ala	Glu	Ser	Cys	Leu	Trp	Glu	His	Gly	Pro	Ala	Ser	Leu
			100					105					110		
Leu	Pro	Ser	Ile	Gly	Gln	Asn	Leu	Gly	Ala	His	Trp	Gly	Arg	Tyr	Arg
		115					120						125		
Pro	Pro	Thr	Phe	His	Val	Gln	Ser	Trp	Tyr	Asp	Glu	Val	Lys	Asp	Phe
		130				135					140				
Ser	Tyr	Pro	Tyr	Glu	His	Glu	Cys	Asn	Pro	Tyr	Cys	Pro	Phe	Arg	Cys
145					150					155					160
Ser	Gly	Pro	Val	Cys	Thr	His	Tyr	Thr	Gln	Val	Val	Trp	Ala	Thr	Ser
				165					170					175	
Asn	Arg	Ile	Gly	Cys	Ala	Ile	Asn	Leu	Cys	His	Asn	Met	Asn	Ile	Trp
			180					185					190		
Gly	Gln	Ile	Trp	Pro	Lys	Ala	Val	Tyr	Leu	Val	Cys	Asn	Tyr	Ser	Pro
		195					200					205			
Lys	Gly	Asn	Trp	Trp	Gly	His	Ala	Pro	Tyr	Lys	His	Gly	Arg	Pro	Cys
	210					215						220			
Ser	Ala	Cys	Pro	Pro	Ser	Phe	Gly	Gly	Gly	Cys	Arg	Glu	Asn	Leu	Cys
225					230					235					240
Tyr	Lys	Glu	Gly	Ser	Asp	Arg	Tyr	Tyr	Pro	Pro	Arg	Glu	Glu	Glu	Thr
				245					250					255	
Asn	Glu	Ile	Glu	Arg	Gln	Gln	Ser	Gln	Val	His	Asp	Thr	His	Val	Arg
		260						265					270		
Thr	Arg	Ser	Asp	Asp	Ser	Ser	Arg	Asn	Glu	Val	Ile	Ser	Ala	Gln	Gln
		275					280						285		
Met	Ser	Gln	Ile	Val	Ser	Cys	Glu	Val	Arg	Leu	Arg	Asp	Gln	Cys	Lys
	290					295						300			
Gly	Thr	Thr	Cys	Asn	Arg	Tyr	Glu	Cys	Pro	Ala	Gly	Cys	Leu	Asp	Ser
305					310					315					320
Lys	Ala	Lys	Val	Ile	Gly	Ser	Val	His	Tyr	Glu	Met	Gln	Ser	Ser	Ile
				325					330					335	
Cys	Arg	Ala	Ala	Ile	His	Tyr	Gly	Ile	Ile	Asp	Asn	Asp	Gly	Gly	Trp
		340						345					350		
Val	Asp	Ile	Thr	Arg	Gln	Gly	Arg	Lys	His	Tyr	Phe	Ile	Lys	Ser	Asn

	355					360					365					
Arg	Asn	Gly	Ile	Gln	Thr	Ile	Gly	Lys	Tyr	Gln	Ser	Ala	Asn	Ser	Phe	
	370					375					380					
Thr	Val	Ser	Lys	Val	Thr	Val	Gln	Ala	Val	Thr	Cys	Glu	Thr	Thr	Val	
385						390					395					400
Asp	Ser	Ser	Val	His	Phe	Ile	Ser	Leu	Leu	His	Ile	Ala	Gln	Glu	Tyr	
				405					410					415		
Thr	Val	Leu	Val	Thr	Val	Cys	Lys	Gln	Ile	His	Ile	Met	Leu	Val		
	420					425					430					

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<210> 3161
<211> 1197
<212> DNA
<213> Homo sapiens
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<400> 3161
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120
ctcaacttgc taaaaatcaa gcatggcgat ttgttggtcc tgtttccctc gagccttgct
180
gggccctcat ctgaaatgga gacgtcagtt ccaccgggct tcaaagtctt tggcgctccc
240
aacgtggttg aggatgagat tgatcagtac ctcagcaaac aggacgggaa gatttacaga
300
agccgagacc cacagctatg ccgccacggc cctttgggga aatgcgtgca ctgcgtccct
360
ctagagccat tcgatgagga ctatctaaac catctcgagc ctcccgtgaa gcacatgtcc
420
ttccacgcct acatccggaa gctgactgga ggggctgaca aggggaagtt tgttgccctg
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600
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660
acaggggaacc agcatttttg gtacttatac ggacgggtaca cggagcacia agacattccc
720
cttggcatca gggctgaagt ggctgcgatt tatgagccac ctcagattgg tacacagaac
780
agcttgagac ttcttgagga tccaaaagct gaagtggctg atgaaattgc tgccaaactt
840
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960
gcaggagact tccagaacaa gcatcccaac atgtgccggc tctctccaga cggacatttt
1020
ggatccaagt ttgttactgc agtggctaca ggtggctcctg acaaccaagt ccactttgaa
1080
gggtaccagg tgtccaatca gtgtatggca ctggtccgtg atgagtgttt gctgccatgc
1140

aaggacgccc cggtatgctg acgccaagga gtctagcagt gagcagtagc tgccaaa
1197

<210> 3162

<211> 386

<212> PRT

<213> Homo sapiens

<400> 3162

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			20					25					30		
Ile	Thr	Ala	Ser	Ser	Asn	Lys	Ser	Leu	Asn	Leu	Leu	Lys	Ile	Lys	His
		35					40					45			
Gly	Asp	Leu	Leu	Phe	Leu	Phe	Pro	Ser	Ser	Leu	Ala	Gly	Pro	Ser	Ser
	50					55					60				
Glu	Met	Glu	Thr	Ser	Val	Pro	Pro	Gly	Phe	Lys	Val	Phe	Gly	Ala	Pro
65					70					75					80
Asn	Val	Val	Glu	Asp	Glu	Ile	Asp	Gln	Tyr	Leu	Ser	Lys	Gln	Asp	Gly
				85					90					95	
Lys	Ile	Tyr	Arg	Ser	Arg	Asp	Pro	Gln	Leu	Cys	Arg	His	Gly	Pro	Leu
			100					105					110		
Gly	Lys	Cys	Val	His	Cys	Val	Pro	Leu	Glu	Pro	Phe	Asp	Glu	Asp	Tyr
		115					120					125			
Leu	Asn	His	Leu	Glu	Pro	Pro	Val	Lys	His	Met	Ser	Phe	His	Ala	Tyr
	130						135					140			
Ile	Arg	Lys	Leu	Thr	Gly	Gly	Ala	Asp	Lys	Gly	Lys	Phe	Val	Ala	Leu
145					150					155					160
Glu	Asn	Ile	Ser	Cys	Lys	Ile	Lys	Ser	Gly	Cys	Glu	Gly	His	Leu	Pro
				165					170					175	
Trp	Pro	Asn	Gly	Ile	Cys	Thr	Lys	Cys	Gln	Pro	Ser	Ala	Ile	Thr	Leu
			180					185					190		
Asn	Arg	Gln	Lys	Tyr	Arg	His	Val	Asp	Asn	Ile	Met	Phe	Glu	Asn	His
		195					200					205			
Thr	Val	Ala	Asp	Arg	Phe	Leu	Asp	Phe	Trp	Arg	Lys	Thr	Gly	Asn	Gln
	210					215					220				
His	Phe	Gly	Tyr	Leu	Tyr	Gly	Arg	Tyr	Thr	Glu	His	Lys	Asp	Ile	Pro
225					230					235					240
Leu	Gly	Ile	Arg	Ala	Glu	Val	Ala	Ala	Ile	Tyr	Glu	Pro	Pro	Gln	Ile
				245					250					255	
Gly	Thr	Gln	Asn	Ser	Leu	Glu	Leu	Leu	Glu	Asp	Pro	Lys	Ala	Glu	Val
		260						265					270		
Val	Asp	Glu	Ile	Ala	Ala	Lys	Leu	Gly	Leu	Arg	Lys	Val	Gly	Trp	Ile
	275						280					285			
Phe	Thr	Asp	Leu	Val	Ser	Glu	Asp	Thr	Arg	Lys	Gly	Thr	Val	Arg	Tyr
	290					295					300				
Ser	Arg	Asn	Lys	Asp	Thr	Tyr	Phe	Leu	Ser	Ser	Glu	Glu	Cys	Ile	Thr
305					310					315					320
Ala	Gly	Asp	Phe	Gln	Asn	Lys	His	Pro	Asn	Met	Cys	Arg	Leu	Ser	Pro
				325					330					335	
Asp	Gly	His	Phe	Gly	Ser	Lys	Phe	Val	Thr	Ala	Val	Ala	Thr	Gly	Gly
			340					345					350		
Pro	Asp	Asn	Gln	Val	His	Phe	Glu	Gly	Tyr	Gln	Val	Ser	Asn	Gln	Cys

355 360 365
 Met Ala Leu Val Arg Asp Glu Cys Leu Leu Pro Cys Lys Asp Ala Pro
 370 375 380
 Val Cys
 385

<210> 3163
 <211> 1075
 <212> DNA
 <213> Homo sapiens

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<212> PRT

<213> Homo sapiens

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Arg Lys Thr Lys Phe Ala Lys Val Pro Leu Lys Cys Leu Ala Gln Glu
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<212> DNA

<213> Homo sapiens

<400> 3167

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<212> PRT

<213> Homo sapiens

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<212> DNA

<213> Homo sapiens

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<210> 3170

<211> 412

<212> PRT

<213> Homo sapiens

<400> 3170

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			20					25					30		
Ala	Tyr	Gln	Gly	Ile	Thr	Gln	Glu	Lys	Ile	Asn	Glu	Met	Arg	Val	Ala
			35					40					45		
Pro	Glu	Gln	Gln	Met	Ile	Ala	Asp	Ile	His	Cys	Met	Ile	Ala	Ala	Gly
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Gln	Asp	Leu	Asp	Trp	Ile	Asp	Ala	Gln	Gly	Ala	Thr	Leu	Leu	His	Ile
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Ala	Gly	Ala	Asn	Gly	Tyr	Leu	Arg	Ala	Ala	Glu	Leu	Leu	Leu	Asp	His
				85						90				95	
Gly	Val	Arg	Val	Asp	Val	Lys	Asp	Trp	Asp	Gly	Trp	Glu	Pro	Leu	His
			100					105					110		
Ala	Ala	Ala	Phe	Trp	Gly	Gln	Met	Gln	Met	Ala	Glu	Leu	Leu	Val	Ser
			115					120					125		
His	Gly	Ala	Ser	Leu	Ser	Ala	Arg	Thr	Ser	Met	Asp	Glu	Met	Pro	Ile
			130					135				140			
Asp	Leu	Cys	Glu	Glu	Glu	Glu	Phe	Lys	Val	Leu	Leu	Leu	Glu	Leu	Lys
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His	Lys	His	Asp	Val	Ile	Met	Lys	Ser	Gln	Leu	Arg	His	Lys	Ser	Ser
				165						170				175	
Leu	Ser	Arg	Arg	Thr	Ser	Ser	Ala	Gly	Ser	Arg	Gly	Lys	Val	Val	Arg
				180						185				190	
Arg	Ala	Ser	Leu	Ser	Asp	Arg	Thr	Asn	Leu	Tyr	Arg	Lys	Glu	Tyr	Glu
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Gly	Glu	Ala	Ile	Leu	Trp	Gln	Arg	Ser	Ala	Ala	Glu	Asp	Gln	Arg	Thr
			210					215					220		
Ser	Thr	Tyr	Asn	Gly	Asp	Ile	Arg	Glu	Thr	Arg	Thr	Asp	Gln	Glu	Asn
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Lys	Asp	Pro	Asn	Pro	Arg	Leu	Glu	Lys	Pro	Val	Leu	Leu	Ser	Glu	Phe
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Pro	Thr	Lys	Ile	Pro	Arg	Gly	Glu	Leu	Asp	Met	Pro	Val	Glu	Asn	Gly
			260					265						270	
Leu	Arg	Ala	Pro	Val	Ser	Ala	Tyr	Gln	Tyr	Ala	Leu	Ala	Asn	Gly	Asp

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Val Trp Lys Val His Glu	Val Pro Asp Tyr Ser Met	Ala Tyr Gly Asn
290	295	300
Pro Gly Val Ala Asp	Ala Thr Pro Pro Trp Ser	Ser Tyr Lys Glu Gln
305	310	315
Ser Pro Gln Thr Leu	Glu Leu Lys Arg Gln	Arg Ala Ala Lys
325	330	335
Leu Leu Ser His Pro	Phe Leu Ser Thr His	Leu Gly Ser Ser Met Ala
340	345	350
Arg Thr Gly Glu Ser	Ser Ser Glu Gly Lys	Ala Xaa Leu Ile Gly Gly
355	360	365
Arg Thr Ser Pro Tyr	Ser Ser Asn Gly Thr	Ser Val Tyr Thr Val
370	375	380
Thr Ser Gly Asp Pro	Pro Pro Leu Leu Lys	Phe Lys Ala Pro Ile Glu Glu
385	390	395
Met Glu Glu Lys Val	His Gly Cys Cys Arg	Ile Ser
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<210> 3171

<211> 753

<212> DNA

<213> Homo sapiens

<400> 3171

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<210> 3172

<211> 228

<212> PRT

<213> Homo sapiens

<400> 3172

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Gly Thr Ser Asp Ala Glu Thr Ser Ala Leu His Ile Val Val Gly Asp
          35           40           45
Ser Leu Ala Met Asp Val Ser Ser Val His His Asn Ser Thr Leu Leu
 50           55           60
Arg Tyr Ser Val Ser Leu Leu Gly Tyr Gly Phe Tyr Gly Asp Ile Ile
 65           70           75           80
Lys Asp Ser Glu Lys Lys Arg Trp Leu Gly Leu Ala Arg Tyr Asp Phe
          85           90           95
Ser Gly Leu Lys Thr Phe Leu Ser His His Cys Tyr Glu Gly Thr Val
          100          105          110
Ser Phe Leu Pro Ala Gln His Thr Val Gly Ser Pro Arg Asp Arg Lys
          115          120          125
Pro Cys Arg Ala Gly Cys Phe Val Cys Arg Gln Ser Lys Gln Gln Leu
          130          135          140
Glu Glu Glu Gln Lys Lys Ala Leu Tyr Gly Leu Glu Ala Ala Glu Asp
145          150          155          160
Val Glu Glu Trp Gln Val Val Cys Gly Lys Phe Leu Ala Ile Asn Ala
          165          170          175
Thr Asn Met Ser Cys Ala Cys Arg Arg Ser Pro Arg Gly Leu Ser Pro
          180          185          190
Ala Ala His Leu Gly Asp Gly Ser Ser Asp Leu Ile Leu Ile Arg Lys
          195          200          205
Cys Ser Arg Phe Asn Phe Leu Arg Phe Leu Ile Trp His Glu Val Cys
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Lys Lys Pro Leu
225

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<210> 3173

<211> 573

<212> DNA

<213> Homo sapiens

<400> 3173

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420

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<210> 3174
 <211> 152
 <212> PRT
 <213> Homo sapiens

<400> 3174
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 35 40 45
 Val Ala Gln Tyr Phe Arg Glu Lys Tyr Thr Leu Gln Leu Lys Tyr Pro
 50 55 60
 His Leu Pro Cys Leu Gln Val Gly Gln Glu Gln Lys His Thr Tyr Leu
 65 70 75 80
 Pro Leu Glu Val Cys Asn Ile Val Ala Gly Gln Arg Cys Ile Lys Lys
 85 90 95
 Leu Thr Asp Asn Gln Thr Ser Thr Met Ile Lys Ala Thr Ala Arg Ser
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 Ala Pro Asp Arg Gln Glu Glu Ile Ser Arg Leu Val Arg Ser Ala Asn
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<210> 3175
 <211> 948
 <212> DNA
 <213> Homo sapiens

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<210> 3176

<211> 92

<212> PRT

<213> Homo sapiens

<400> 3176

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Ala	Leu	Leu	Gly	Gly	Arg	Trp	Leu	Gln	Pro	Arg	Ala	Trp	Leu	Gly	Phe
			20					25					30		
Pro	Asp	Ala	Trp	Gly	Leu	Pro	Thr	Pro	Gln	Gln	Ala	Arg	Gly	Lys	Ala
			35				40					45			
Arg	Gly	Asn	Glu	Tyr	Gln	Pro	Ser	Asn	Ile	Lys	Arg	Lys	Asn	Lys	His
		50				55					60				
Gly	Trp	Val	Arg	Arg	Leu	Ser	Thr	Pro	Ala	Gly	Val	Gln	Val	Ile	Leu
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<210> 3177

<211> 1857

<212> DNA

<213> Homo sapiens

<400> 3177

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<210> 3178

<211> 273

<212> PRT

<213> Homo sapiens

<400> 3178

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Glu Gln Val Gln Phe Gln Pro Asn Thr Val Asn Thr Leu Ala Cys Pro
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Leu Leu Ser Asn Leu Ala Thr Arg Leu Trp Leu Arg Asn Gly Ala Pro
 50           55           60
Val Asn Ala Ser Ala Ser Cys His Val Leu Pro Thr Gly Asp Leu Leu
 65           70           75           80
Leu Val Gly Thr Gln Gln Leu Gly Glu Phe Gln Cys Trp Ser Leu Glu
 85           90           95
Glu Gly Phe Gln Gln Leu Val Ala Ser Tyr Cys Pro Glu Val Val Glu
 100          105          110
Asp Gly Val Ala Asp Gln Thr Asp Glu Gly Gly Ser Val Pro Val Ile
 115          120          125
Ile Ser Thr Ser Arg Val Ser Ala Pro Ala Gly Gly Lys Ala Ser Trp
 130          135          140
Gly Ala Asp Arg Ser Tyr Trp Lys Glu Phe Leu Val Met Cys Thr Leu
 145          150          155          160
Phe Val Leu Ala Val Leu Leu Pro Val Leu Phe Leu Leu Tyr Arg His
 165          170          175
Arg Asn Ser Met Lys Val Phe Leu Lys Gln Gly Glu Cys Ala Ser Val
 180          185          190
His Pro Lys Thr Cys Pro Val Val Leu Pro Pro Glu Thr Arg Pro Leu
 195          200          205
Asn Gly Leu Gly Pro Pro Ser Thr Pro Leu Asp His Arg Gly Tyr Gln
 210          215          220
Ser Leu Ser Asp Ser Pro Pro Gly Ala Arg Val Phe Thr Glu Ser Glu
 225          230          235          240
Lys Arg Pro Leu Ser Ile Gln Asp Ser Phe Val Glu Val Ser Pro Val
 245          250          255
Cys Pro Arg Pro Arg Val Arg Leu Gly Ser Glu Ile Arg Asp Ser Val
 260          265          270
Val

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<210> 3179

<211> 3447

<212> DNA

<213> Homo sapiens

<400> 3179

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1920
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1980
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2820
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<210> 3180

<211> 127

<212> PRT

<213> Homo sapiens

<400> 3180

Met	Ser	Phe	Thr	Asn	Lys	Ser	Arg	Gln	Val	Ser	Gln	Pro	Glu	Ile	Ser
1				5					10					15	
Thr	Gln	Thr	Asp	Gly	Arg	Asp	Val	Asn	Ser	Cys	Leu	Lys	Leu	Arg	Cys
			20					25					30		
Ala	Phe	Thr	Pro	Thr	Gly	Lys	Val	Lys	Leu	Thr	Phe	Val	Phe	Leu	Phe
			35				40					45			
Asn	Asn	Phe	Met	Ile	Asn	Lys	Glu	Leu	Gln	Leu	Glu	Thr	Lys	Ala	Asn
	50					55					60				
Ser	Arg	Asn	Ser	Leu	Thr	Pro	Ser	Cys	Pro	Met	Val	Phe	Met	Ile	Ala
65					70					75				80	
Cys	Tyr	Gln	Asn	Glu	Ala	Leu	Cys	Ser	Thr	Leu	Tyr	Ser	Lys	Ala	Phe
			85						90					95	
Tyr	Ala	Pro	Thr	Arg	Pro	Ser	Gly	Ile	Pro	Glu	Ser	Ala	Leu	His	Thr
			100					105					110		
Gly	Arg	Lys	Thr	Ala	Ser	Ser	Tyr	Arg	Leu	Cys	Glu	Asn	Thr	Gln	
		115					120					125			

<210> 3181

<211> 287

<212> DNA

<213> Homo sapiens

<400> 3181

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ggacgcgcgc cgcaacaagt gccgcattcg cctggggcggg cacatgaagc aggggggcct
120
cctcaaggac ggctgggctt ctccctgcac tcgcagctcg ccaagttcct gttggaccgg
180
tacacttctt caggctgtgt cctctgtgca ggtcctgagc ttttgcttcc aaaaggtctg
240
cagtatctgg tgctcttgtc tcatgccccca caccggagat gcaccct
287

<210> 3182

<211> 95

<212> PRT

<213> Homo sapiens

<400> 3182

Met	Ala	Ser	Ser	Pro	Ala	Val	Asp	Val	Ser	Cys	Arg	Arg	Arg	Gly	Glu
1				5					10					15	
Arg	Arg	Gln	Leu	Asp	Ala	Arg	Arg	Asn	Lys	Cys	Arg	Ile	Arg	Leu	Gly
			20					25					30		
Gly	His	Met	Lys	Gln	Gly	Gly	Leu	Leu	Lys	Asp	Gly	Trp	Ala	Ser	Pro

Cys	Thr	Arg	Ser	Ser	Pro	Ser	Ser	Cys	Trp	Thr	Gly	Thr	Leu	Leu	Gln	
	50					55					60					
Ala	Val	Ser	Ser	Val	Gln	Val	Leu	Ser	Phe	Cys	Leu	Gln	Lys	Val	Cys	
65					70					75					80	
Ser	Ile	Trp	Cys	Ser	Cys	Leu	Met	Pro	His	Thr	Gly	Asp	Ala	Pro		
				85					90					95		

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<210> 3183
<211> 1457
<212> DNA
<213> Homo sapiens
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<400> 3183
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120
aaagttctcc ctgagagctg caggctgtcc tggaatctcc tcggggatga ggcagctgcc
180
gagctggccc aggtgctgcc gcagatgggc cggctgaaga gagtggacct ggagaagaat
240
cagatcacag ctttgggggc ctggctcctg gctgaaggac tggcccaggg gtctagcatc
300
caagtcattc gcctctggaa taacccatt ccctgcgaca tggcccagca cctgaagagc
360
caggagccca ggetggactt tgccttcttt gacaaccagc ccagggcccc ttgggggtact
420
tgatggcccc ctcaagacct ttggaatcca gccaaagtgt gcacccaaat gatccacctt
480
tcgcccactg ggataaatga ctcaggaaag aagagcctcg gcagggcgct ctgcactcca
540
cccaggagga aggatacgtg tgtcctgctg cagtcctcag ggagaacttt tttgggaacc
600
aggagctggg tctggacaaa ggagtaccct gcattacgtg ggatatgtgt gatcaattgg
660
ggacatgcga cacacaatga ggggtgtcatg acaatgcatt acacgtacgg ttatatgtgg
720
cagtgtgacc ccttgacatg tggcgttaca tgaaagtcag tgtggcacgt gttctgtggc
780
atgggtgctg gcatcccaag tggcaggata catgattgtt ggtctatata tgacacatga
840
caaatgtcca tgtcacagga ctcatggctg gccagatgac ctcaggctgg cccaagatct
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960
caggaaaaagt cttccgcccc agctgggagg ggagagtgtc catgcactga ccagtcagg
1020
ggctcaaggg ccagggtctt ggaacaagcc agggactcag ccattaagtc ccctcctgcc
1080
tcaatcctca gcctacccat ctataaactt gatgactcct cccttactta catactagct
1140
tccaaggaca ggtggaggta gggccagcct ggcgggagtg gagaagccca gtctgtccta
1200
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tgtaaggagac aaagccaggt ctaatggtac tgggtagggg gcactgccaa gacaataagc
 1260
 taggctactg ggtccagcta ctactttggt gggattcagg tgagtctcca tgcacttcac
 1320
 atgttaccca gtgttcttgt tacttccaag gagaaccaag aatggctctg tcacactcga
 1380
 agccaggttt gatcaataaa cacaatggta ttccaaaaaa aaaaaaaaaa aaaaaaaaaa
 1440
 aaaaaaaaaa aaaaaaa
 1457

<210> 3184

<211> 140

<212> PRT

<213> Homo sapiens

<400> 3184

Xaa	Tyr	Val	Ser	Cys	Ile	Val	Met	Thr	Pro	Ser	Leu	Cys	Val	Ala	Cys
1				5					10					15	
Pro	Gln	Leu	Ile	Thr	His	Ile	Pro	Arg	Asn	Ala	Gly	Tyr	Ser	Phe	Val
			20					25					30		
Gln	Thr	Gln	Leu	Leu	Val	Pro	Lys	Lys	Val	Leu	Pro	Glu	Ser	Cys	Arg
		35					40					45			
Leu	Ser	Trp	Asn	Leu	Leu	Gly	Asp	Glu	Ala	Ala	Ala	Glu	Leu	Ala	Gln
	50					55					60				
Val	Leu	Pro	Gln	Met	Gly	Arg	Leu	Lys	Arg	Val	Asp	Leu	Glu	Lys	Asn
65					70				75					80	
Gln	Ile	Thr	Ala	Leu	Gly	Ala	Trp	Leu	Leu	Ala	Glu	Gly	Leu	Ala	Gln
			85					90					95		
Gly	Ser	Ser	Ile	Gln	Val	Ile	Arg	Leu	Trp	Asn	Asn	Pro	Ile	Pro	Cys
			100					105					110		
Asp	Met	Ala	Gln	His	Leu	Lys	Ser	Gln	Glu	Pro	Arg	Leu	Asp	Phe	Ala
	115						120					125			
Phe	Phe	Asp	Asn	Gln	Pro	Gln	Ala	Pro	Trp	Gly	Thr				
	130					135					140				

<210> 3185

<211> 1433

<212> DNA

<213> Homo sapiens

<400> 3185

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 120
 cctggtaacc tgaggaggtg tagagcacc agaaggaagg gtaaaagcag ggggcaaagc
 180
 ggtggccctc cttttctggg ggtcacttct gggctggggc cagctgaaac ctgtgtccaa
 240
 gtagctttca gggctggcca caccctaagc cttgcaaaag ggctcctgc aagggtggc
 300
 ccatggggtc ccaccttcc cagccagtga ggtagcatg gtaggagtc cacatgtgtg
 360

caagtgcttg tgtggaggct catgtatgca tgtgtgtata tgcaaagctg cacatgacaa
 420
 tgtgcatgcc agtccagagt tagatgtacc tatgcagttg ccctcaagcg aagggtcata
 480
 tttggaacaa aggatggctc taaacatgta agcgtgcatg tgggcatgta tgtatctggg
 540
 gcctaaggag gtggggaagt ggggtgtggg gtaagggtg gccttcaggg catttgcaga
 600
 aggaggagtg ggtgggaggg aaaggctggg cagagcaggg gaaggagtga aagccaggca
 660
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 720
 ttgattcctg agagtttttt ctcttgattt taccctca gtctatcact gcaagagaaa
 780
 gaggtagaaa agacaaacag accacaaaag acaagaacc agacatatag acagacgcac
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 ctgttgcatg tgcattga agagcctggg agagaagaga gagcgtgcaa gagagagctc
 900
 agagcaggca ggcagccac cccctgcagc agtgctgggc ttcactggag cccctgcagg
 960
 aagtccagca gccctgtatg ccaactcctt ggtttgtcca ggtaacaggg gtgccccgcc
 1020
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 1320
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 1380
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 1433

<210> 3186

<211> 112

<212> PRT

<213> Homo sapiens

<400> 3186

Met	Pro	Leu	Leu	Trp	Phe	Val	Gln	Val	Thr	Gly	Val	Pro	Arg	Pro	Leu
1				5					10					15	
His	Asp	Gln	His	Pro	Val	Val	Gly	Gln	Leu	Leu	Gln	Val	Leu	Lys	Ala
			20					25					30		
Gly	Leu	Thr	His	Gly	Val	Leu	Val	Ser	Ile	Tyr	Asn	Gln	Ser	Trp	Ser
		35					40					45			
Leu	Arg	Gly	Arg	Ile	Gly	Gly	Trp	Gly	Arg	Val	Asn	Arg	Thr	Cys	His
		50				55				60					
Ser	Ile	Pro	Ser	Pro	Pro	His	Phe	Ser	Leu	Phe	Leu	Gly	Pro	Pro	His
65					70				75					80	
Met	Arg	Glu	Arg	Asp	Lys	Leu	Ala	Gln	Trp	Val	Gly	Ala	Gln	Ile	Gly

				85						90					95				
Val	Cys	Pro	Arg	Thr	Gln	Phe	Ser	Thr	Gly	Leu	Gly	Thr	Val	Val	Cys				
			100						105					110					

<210> 3187

<211> 860

<212> DNA

<213> Homo sapiens

<400> 3187

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120
aagtggctct cccgcctcgg cctcctgagt agctgggatt acagatatgt tcctaaaaca
180
tccttgagtt caccaccttg gccagaagtt gttctgccag acccagttga ggagaccaga
240
caccatgcag aggtcgtgaa gaaggtgaat gagatgatcg tcacggggca gtatggcagg
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360
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420
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480
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540
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660
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720
ggtgtggggc acgtgggtct cgggacagga agcccaggca ggtctcaacc tggctgccac
780
tgcccacttg ccacctcat cctagaggga gcaccagag ggtccagcct cgctcccctt
840
ctcctccacg ctccacgct
860

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<210> 3188

<211> 120

<212> PRT

<213> Homo sapiens

<400> 3188

Thr	Pro	Gly	Leu	Lys	Trp	Ser	Ser	Arg	Leu	Gly	Leu	Leu	Ser	Ser	Trp				
1				5					10					15					
Asp	Tyr	Arg	Tyr	Val	Pro	Lys	Thr	Ser	Leu	Ser	Ser	Pro	Pro	Trp	Pro				
			20					25					30						
Glu	Val	Val	Leu	Pro	Asp	Pro	Val	Glu	Glu	Thr	Arg	His	His	Ala	Glu				
			35				40					45							
Val	Val	Lys	Lys	Val	Asn	Glu	Met	Ile	Val	Thr	Gly	Gln	Tyr	Gly	Arg				

```

      50              55              60
Leu Phe Ala Val Val His Phe Ala Ser Arg Gln Trp Lys Val Thr Ser
65              70              75              80
Glu Asp Leu Ile Leu Ile Gly Asn Glu Leu Asp Leu Ala Cys Gly Glu
      85              90              95
Arg Ile Arg Leu Glu Lys Val Leu Leu Val Gly Ala Asp Asn Phe Thr
      100              105              110
Leu Leu Gly Lys Pro Leu Leu Gly
      115              120

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<210> 3189

<211> 440

<212> DNA

<213> Homo sapiens

<400> 3189

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nngggccccc aagggcatgg atggggccgg actctggcct ggctgtcaac aagagggctg
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agcctgggga agcaagtccc tgttttcagt accacctgca tccccaggg cagcatcctt
120
gactccccct ctggggccagt gctgccctgc tttctctgtc tctttcaggg tgtgctgtcc
180
gacctcacca aagtgaccgg gatgcatgga atcgaccctg tgggtgctgg cctgatgggtg
240
ggcatgggtga tgttcacccct ggggttcgcc ggctgcgtgg gggctctgcg ggagaatata
300
tgcttgctca actttgtgag tggccacaga gacaagagtg ggatatgatg caatggggta
360
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420
cctcccctat ggcccctgcc
440

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<210> 3190

<211> 111

<212> PRT

<213> Homo sapiens

<400> 3190

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Gly His Gly Trp Gly Arg Thr Leu Ala Trp Leu Ser Thr Arg Gly Leu
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Ser Leu Gly Lys Gln Val Pro Val Phe Ser Thr Thr Cys Ile Pro Gln
      20              25              30
Gly Ser Ile Leu Asp Ser Pro Ser Gly Pro Val Leu Pro Cys Phe Leu
      35              40              45
Cys Leu Phe Gln Gly Val Leu Ser Asp Leu Thr Lys Val Thr Arg Met
      50              55              60
His Gly Ile Asp Pro Val Val Leu Val Leu Met Val Gly Met Val Met
65              70              75              80
Phe Thr Leu Gly Phe Ala Gly Cys Val Gly Ala Leu Arg Glu Asn Ile
      85              90              95
Cys Leu Leu Asn Phe Val Ser Gly His Arg Asp Lys Ser Gly Ile
      100              105              110

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<210> 3191
 <211> 266
 <212> DNA
 <213> Homo sapiens

<400> 3191
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 120
 aacagcagga caatccacac ttccgtagcc tcctgggggtc ggccgccgag ccagccccggg
 180
 gcccgccgcc ccagcaccgc ttgcagggca gaaaagagaa gagagttgac aacatcgaga
 240
 tacagaaatt catctcccaa aaagcg
 266

<210> 3192
 <211> 84
 <212> PRT
 <213> Homo sapiens

<400> 3192
 Met Asn Phe Cys Ile Ser Met Leu Ser Thr Leu Phe Ser Phe Leu Pro
 1 5 10 15
 Cys Asn Gly Cys Trp Gly Gly Gly Pro Arg Ala Gly Ser Ala Ala Asp
 20 25 30
 Pro Arg Arg Leu Arg Lys Cys Gly Leu Ser Cys Cys Ser Leu Arg Ser
 35 40 45
 Arg Glu Ser Lys Asp Asp Pro Trp Gln Phe Ser Asp Cys Arg Lys Arg
 50 55 60
 Ser Arg Ser Met Ala Gln Val Ala Asp Thr Glu Gln Gly Thr Ile Ser
 65 70 75 80
 Pro Ser Ala Ser

<210> 3193
 <211> 567
 <212> DNA
 <213> Homo sapiens

<400> 3193
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 acagcctgcc tgagtgttca gatccaggct ctgccagag ctggatgtaa atttatgacc
 120
 tggagtgagt tgttttgccc ctctgagcct cagtttctcc atctgtgaaa tggggacaac
 180
 agcagttcct tccaggaggg taaaaggagg agaaaaagaa tgcagatcca gccctcggca
 240
 gagtcagcgg ttcattgcttt gcatgcaaag tgcccagccc ctgggtcaaa gtctgtgttc
 300
 atccagacct gggttaacta ctgtcttctt tatgttgttc ctgtggggac gcctggggct
 360

gctggcctcg tgattcctct ctttcctgc aggccacggg tcacctactt ccccttctcc
 420
 ctggggccacc gctcctgcat cgggcagcag tttgctcaga tggaggtgaa ggtgggcatg
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 540
 gagcaggcca cactcaagcc actggac
 567

<210> 3194
 <211> 116
 <212> PRT
 <213> Homo sapiens

<400> 3194
 Met Gln Ile Gln Pro Ser Ala Glu Ser Ala Val His Ala Leu His Ala
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 Lys Cys Pro Ala Pro Gly Ser Lys Ser Val Phe Ile Gln Thr Trp Val
 20 25 30
 Asn Tyr Cys Leu Pro Tyr Val Val Pro Val Gly Thr Pro Gly Ala Ala
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 Gly Leu Val Ile Pro Leu Phe Pro Cys Arg Pro Arg Phe Thr Tyr Phe
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 Pro Phe Ser Leu Gly His Arg Ser Cys Ile Gly Gln Gln Phe Ala Gln
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 Met Glu Val Lys Val Val Met Ala Lys Leu Leu Gln Arg Leu Glu Phe
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 <212> DNA
 <213> Homo sapiens

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<210> 3196

<211> 153

<212> PRT

<213> Homo sapiens

<400> 3196

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Ala	Ile	Arg	Lys	Pro	Gln	Thr	Pro	Thr	Ser	Leu	Ala	Gly	Ser	Ala	Lys
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Gly	Gly	Gln	Asp	Gly	Ser	Gln	Arg	Ser	Ser	Ile	His	Phe	Glu	Thr	Glu
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Glu	Ala	Asn	Arg	Ser	Phe	Leu	Ser	Gly	Ile	Lys	Thr	Ile	Leu	Lys	Lys
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Ser	Pro	Glu	Pro	Lys	Glu	Asp	Pro	Ala	His	Leu	Ser	Asp	Ser	Ser	Ser
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<211> 5575

<212> DNA

<213> Homo sapiens

<400> 3197

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<210> 3198

<211> 833

<212> PRT

<213> Homo sapiens

<400> 3198

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Val	Met	Arg	Leu	Asn	Lys	Glu	Asp	Met	His	Leu	Phe	Gly	His	Tyr	Pro
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Ala	His	Asp	Asp	Phe	Tyr	Leu	Val	Val	Cys	Ser	Ala	Cys	Asn	Gln	Val
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Val	Lys	Pro	Gln	Val	Phe	Gln	Ser	His	Cys	Glu	Arg	Arg	His	Gly	Ser
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Met	Cys	Arg	Pro	Ser	Pro	Ser	Pro	Val	Ser	Pro	Ala	Ser	Asn	Pro	Arg
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Thr	Ser	Leu	Val	Gln	Val	Lys	Thr	Lys	Ala	Cys	Leu	Ser	Gly	His	His
		115				120						125			
Ser	Ala	Ser	Ser	Thr	Ser	Lys	Pro	Phe	Lys	Thr	Pro	Lys	Asp	Asn	Leu
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Leu	Thr	Ser	Ser	Ser	Lys	Gln	His	Thr	Val	Phe	Pro	Ala	Lys	Gly	Ser
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Arg	Asp	Lys	Pro	Cys	Val	Pro	Val	Pro	Val	Val	Ser	Leu	Glu	Lys	Ile
				165				170						175	
Pro	Asn	Leu	Val	Lys	Ala	Asp	Gly	Ala	Asn	Val	Lys	Met	Asn	Ser	Thr
		180						185					190		
Thr	Thr	Thr	Ala	Val	Ser	Ala	Ser	Pro	Thr	Ser	Ser	Ser	Ala	Val	Ser

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Thr	Pro	Pro	Leu	Ile	Lys	Pro	Val	Leu	Met	Ser	Lys	Ser	Val	Pro	Pro	
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Ser	Pro	Glu	Lys	Ile	Leu	Asn	Gly	Lys	Gly	Ile	Leu	Pro	Thr	Thr	Ile	
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Asp	Lys	Lys	His	Gln	Asn	Gly	Thr	Lys	Asn	Ser	Asn	Lys	Pro	Tyr	Arg	
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Asp	Pro	Glu	Thr	Lys	Lys	Pro	Cys	Thr	Arg	Ser	Leu	Thr	Cys	Lys	Thr	
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Asp	Leu	Leu	Leu	Ala	Glu	His	Lys	Ala	Lys	Ser	Arg	Glu	Lys	Glu	Val	
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Lys	Asp	Lys	Glu	His	Leu	Leu	Thr	Ser	Thr	Arg	Glu	Ile	Leu	Pro	Ser	
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Gln	Ser	Gly	Pro	Ala	Gln	Asp	Ser	Leu	Leu	Gly	Ser	Ser	Gly	Ser	Ser	
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Asn	Ser	Met	Val	Glu	Lys	His	Leu	Asn	Ser	Gln	Met	Trp	Lys	Lys	Ile	
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 Val Gly Ala Val Gly Gly Ser Ser Asp Ser Cys Pro Leu Ser Val Pro
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 Val Pro Asp Pro Val Asn Ser Thr Ser Ser Arg Gln Val Gly Lys Asn
 785 790 795 800
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<210> 3199

<211> 777

<212> DNA

<213> Homo sapiens

<400> 3199

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35 40 45
Val Ser Pro Arg Ser Pro Val Pro Ala Val Gly Ala Ala Cys Cys Met
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Pro Gly Pro Ala Thr Ala Ser Gln Arg Ala Gly Ala Leu Thr Ser Thr
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Trp Ser Cys Leu Pro His Cys Ser Ser Arg Arg Val
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<210> 3201
<211> 390
<212> DNA
<213> Homo sapiens

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<212> PRT
<213> Homo sapiens

<400> 3202
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			20					25					30				
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Val	Ala	Glu	Gly	Pro	Gly	Gly	Val	Gln	Val	Pro	Asn	Pro	Ser	Glu	Pro		
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Asp	Pro	Asp	Met	Gly	Pro	Val	Ser	Trp	Gly	Pro	Pro	Leu	Cys	Pro	Val		
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Val	Ala	Asp	Pro	Glu	Arg	Glu	Gly	Cys	Gly	Asp	Ala	His	Met	Thr	Leu		
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<210> 3203

<211> 1906

<212> DNA

<213> Homo sapiens

<400> 3203

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960

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<210> 3204

<211> 424

<212> PRT

<213> Homo sapiens

<400> 3204

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 35 40 45
 Ile Glu Lys Ala Tyr Ala Gln Gln Leu Ala Asp Trp Ala Arg Lys Trp
 50 55 60
 Arg Gly Thr Val Glu Lys Gly Pro Gln Tyr Gly Thr Leu Glu Lys Ala
 65 70 75 80
 Trp His Ala Phe Phe Thr Ala Ala Glu Arg Leu Ser Ala Leu His Leu
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 Glu Val Arg Glu Lys Leu Gln Gly Gln Asp Ser Glu Arg Val Arg Ala
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<210> 3205

<211> 1482

<212> DNA

<213> Homo sapiens

<400> 3205

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120

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240

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 1380
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 1482

<210> 3206

<211> 494

<212> PRT

<213> Homo sapiens

<400> 3206

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Arg	Ser	Pro	Pro	Gly	Leu	Ala	Lys	Thr	Pro	Leu	Ser	Ala	Leu	Gly	Leu
			20					25					30		
Lys	Pro	His	Asn	Pro	Ala	Asp	Ile	Leu	Leu	His	Pro	Thr	Gly	Glu	Pro

2418

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Phe Val Gln Asp Thr Ser Lys Tyr Trp Tyr Lys Pro Lys Ile
485 490

<210> 3207
<211> 495
<212> DNA
<213> Homo sapiens

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180
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240
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300
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360
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480
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495

<210> 3208
<211> 107
<212> PRT
<213> Homo sapiens

<400> 3208
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Ala Ile Asn Glu Glu Phe Val Ser Ile Phe Lys Glu Val Lys Glu Glu
35 40 45
Leu Glu Ser Ile Ser Glu Asp Val Gln Ala Met Ser Asn Cys Cys Gln
50 55 60
Asp Met Thr Ser Arg Leu Gln Ala Ala Lys Glu Gln Thr Gln Asp Leu
65 70 75 80
Ile Val Asn Thr Thr Lys Leu Gln Ser Glu Ser Gln Lys Leu Glu Ile
85 90 95
Arg Ala Gln Val Ala Asp Ala Phe Leu Ser Lys
100 105

<210> 3209
<211> 346
<212> DNA
<213> Homo sapiens

<400> 3209

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 240
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<210> 3210

<211> 95

<212> PRT

<213> Homo sapiens

<400> 3210

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Cys	Ser	His	Ser	Arg	Arg	Ile	Ser	Pro	Thr	Val	Gln	Gly	Cys	Val	Ser
			20					25					30		
Gly	Glu	Arg	Ala	Leu	Gly	Ser	Cys	Gly	Asn	Gln	Gly	Pro	Pro	Ile	Leu
			35				40					45			
Val	Pro	Val	Ile	Gly	Cys	Ile	Pro	Ser	Ser	Cys	Leu	Cys	Leu	Ser	Trp
			50				55				60				
Pro	Val	Trp	Ser	Pro	Cys	Val	His	Leu	Ser	Pro	Ser	His	Gly	Leu	Ser
65					70					75				80	
Asn	Trp	Gly	Phe	Arg	Leu	Pro	Met	Arg	Gly	Ser	Trp	Tyr	Val	Arg	
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<210> 3211

<211> 1728

<212> DNA

<213> Homo sapiens

<400> 3211

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 240
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 360
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 420

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 480
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 540
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 780
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 1320
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<210> 3212

<211> 87

<212> PRT

<213> Homo sapiens

<400> 3212

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[illegible]

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<210> 3213
<211> 348
<212> DNA
<213> Homo sapiens
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348
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<210> 3214
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<212> PRT
<213> Homo sapiens
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<400> 3214
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          20          25          30
Gly Gln His Phe Cys Asp Val Gln Leu Gln Val Gly Gln Glu Ser Phe
          35          40          45
Lys Ala His Arg Leu Val Leu Ala Ala Ser Ser Pro Tyr Phe Ala Ala
 50          55          60
Leu Phe Thr Gly Gly Met Lys Glu Ser Ser Lys Asp Val Val Pro Ile
65          70          75          80
Leu Gly Ile Glu Ala Gly Ile Phe Gln Ile Leu Leu
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<210> 3215
<211> 597
<212> DNA
<213> Homo sapiens
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<400> 3215

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 120
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<210> 3216

<211> 153

<212> PRT

<213> Homo sapiens

<400> 3216

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Ile	Leu	Asn	Val	Cys	Asn	Thr	Gly	Asp	Lys	Met	Val	Glu	Cys	Gln	Leu
			20					25					30		
Glu	Thr	His	Asn	His	Lys	Met	Val	Thr	Phe	Lys	Phe	Asp	Leu	Asp	Gly
		35					40					45			
Asp	Ala	Pro	Asp	Glu	Ile	Ala	Thr	Tyr	Met	Val	Glu	His	Asp	Phe	Ile
	50					55					60				
Leu	Gln	Ala	Glu	Arg	Glu	Thr	Phe	Ile	Glu	Gln	Met	Lys	Asp	Val	Met
65				70					75					80	
Asp	Lys	Ala	Glu	Asp	Met	Leu	Ser	Glu	Asp	Thr	Asp	Ala	Asp	Arg	Gly
			85					90					95		
Ser	Asp	Pro	Gly	Thr	Ser	Pro	Pro	His	Leu	Ser	Thr	Cys	Gly	Leu	Gly
		100						105					110		
Thr	Gly	Glu	Glu	Ser	Arg	Gln	Ser	Gln	Ala	Asn	Ala	Pro	Val	Tyr	Gln
	115					120						125			
Gln	Asn	Val	Leu	His	Thr	Gly	Lys	Arg	Trp	Phe	Ile	Ile	Cys	Pro	Val
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<210> 3217

<211> 2570

<212> DNA

<213> Homo sapiens

<400> 3217

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gatgtgggcc cagaaaacaa gccagtcagt gttcaagaga cctatgaagc caaaagacat
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720
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 2220
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 2280
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 2340
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<210> 3218

<211> 181

<212> PRT

<213> Homo sapiens

<400> 3218

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Glu	Asn	His	Cys	Asp	Phe	Val	Lys	Leu	Arg	Glu	Met	Leu	Ile	Cys	Thr
			20					25					30		
Asn	Met	Glu	Asp	Leu	Arg	Glu	Gln	Thr	His	Thr	Arg	His	Tyr	Glu	Leu
		35					40					45			
Tyr	Arg	Arg	Cys	Lys	Leu	Glu	Glu	Met	Gly	Phe	Thr	Asp	Val	Gly	Pro
		50				55					60				
Glu	Asn	Lys	Pro	Val	Ser	Val	Gln	Glu	Thr	Tyr	Glu	Ala	Lys	Arg	His
65					70				75					80	
Glu	Phe	His	Gly	Glu	Arg	Gln	Arg	Lys	Glu	Glu	Glu	Met	Lys	Gln	Met
			85					90						95	
Phe	Val	Gln	Arg	Val	Lys	Glu	Lys	Glu	Ala	Ile	Leu	Lys	Glu	Ala	Glu
			100					105					110		
Arg	Glu	Leu	Gln	Ala	Lys	Phe	Glu	His	Leu	Lys	Arg	Leu	His	Gln	Glu

	115		120		125	
Glu	Arg	Met	Lys	Leu	Glu	Glu
	130		135		140	
Ile	Ala	Phe	Ser	Lys	Lys	Lys
145			150		155	160
Ser	Phe	Leu	Ala	Thr	Gly	Ser
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Asn	Ser	Asn	Phe	Leu		
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<210> 3219

<211> 1241

<212> DNA

<213> Homo sapiens

<400> 3219

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240
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1080
gcctcttctt ccttgctgc cttcttccg accacccaca gcctccagg gcctcagcaa
1140

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 1241

<210> 3220
 <211> 413
 <212> PRT
 <213> Homo sapiens

<400> 3220
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 Val Asn Gly Gly Xaa Val Thr Ser Glu Arg Glu Thr Asp Ile Leu Asp
 35 40 45
 Asp Glu Leu Pro Asn Gln Asp Gly His Ser Ala Gly Ser Met Gly Thr
 50 55 60
 Leu Ser Ser Leu Asp Gly Val Thr Asn Ile Ser Glu Gly Gly Tyr Pro
 65 70 75 80
 Glu Ala Leu Ser Pro Leu Thr Asn Gly Leu Asp Lys Ser Tyr Pro Met
 85 90 95
 Glu Pro Met Val Asn Gly Gly Gly Tyr Pro Tyr Glu Ser Ala Ser Arg
 100 105 110
 Ala Gly Pro Ala His Ala Gly His Thr Ala Pro Met Arg Pro Ser Tyr
 115 120 125
 Ser Ala Gln Glu Gly Leu Ala Gly Tyr Gln Arg Glu Gly Pro His Pro
 130 135 140
 Ala Trp Pro Gln Pro Val Thr Thr Ser His Tyr Ala His Asp Pro Ser
 145 150 155 160
 Gly Met Phe Arg Ser Gln Ser Phe Ser Glu Ala Glu Pro Gln Leu Pro
 165 170 175
 Pro Ala Pro Val Arg Gly Gly Ser Ser Arg Glu Ala Val Gln Arg Gly
 180 185 190
 Leu Asn Ser Trp Gln Gln Gln Gln Gln Gln Gln Gln Pro Arg Pro
 195 200 205
 Pro Pro Arg Gln Gln Glu Arg Ala His Leu Glu Ser Leu Val Ala Ser
 210 215 220
 Arg Pro Ser Pro Gln Pro Leu Ala Glu Thr Pro Ile Pro Ser Leu Pro
 225 230 235 240
 Glu Phe Pro Arg Ala Ala Ser Gln Gln Glu Ile Glu Gln Ser Ile Glu
 245 250 255
 Thr Leu Asn Met Leu Met Leu Asp Leu Glu Pro Ala Ser Ala Ala Ala
 260 265 270
 Pro Leu His Lys Ser Gln Ser Val Pro Gly Ala Trp Pro Gly Ala Ser
 275 280 285
 Pro Leu Ser Ser Gln Pro Leu Ser Gly Ser Ser Arg Gln Ser His Pro
 290 295 300
 Leu Thr Gln Ser Arg Ser Gly Tyr Ile Pro Ser Gly His Ser Leu Gly
 305 310 315 320
 Thr Pro Glu Pro Ala Pro Arg Ala Ser Leu Glu Ser Val Pro Pro Gly
 325 330 335
 Arg Ser Tyr Ser Pro Tyr Asp Tyr Gln Pro Cys Leu Ala Gly Pro Asn

	340		345		350
Gln Asp Phe His Ser Lys Ser Pro Ala Ser Ser Ser Leu Pro Ala Phe					
	355		360		365
Leu Pro Thr Thr His Ser Pro Pro Gly Pro Gln Gln Pro Pro Ala Ser					
	370		375		380
Leu Pro Gly Leu Thr Ala Gln Pro Leu Leu Ser Pro Lys Glu Ala Thr					
385		390		395	400
Ser Asp Pro Ser Arg Thr Pro Glu Glu Glu Pro Leu Asn					
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<210> 3221

<211> 1585

<212> DNA

<213> Homo sapiens

<400> 3221

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180
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240
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540
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720
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960
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cagtttgcac attgcacaaa caatgggggtg aaagtggggg actgtgatct gcgggacaga
1080
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1140

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 aacttacttg tgtaactgac aatttctgca gaaatcccc ttcctctaaa ttccctttac
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 1320
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 1440
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<210> 3222

<211> 331

<212> PRT

<213> Homo sapiens

<400> 3222

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Trp	Val	Glu	Glu	Pro	Gln	Arg	Ser	Cys	Thr	Ala	Arg	Arg	Trp	His	Ile
			20					25					30		
Gln	Ala	Thr	Gly	Gly	Val	Glu	Pro	Ala	Gly	Trp	Lys	Glu	Met	Arg	Cys
			35					40				45			
His	Leu	Arg	Ala	Asn	Gly	Tyr	Leu	Cys	Lys	Tyr	Gln	Phe	Glu	Val	Leu
	50					55					60				
Cys	Pro	Ala	Pro	Arg	Pro	Gly	Ala	Ala	Ser	Asn	Leu	Ser	Tyr	Arg	Ala
65					70					75				80	
Pro	Phe	Gln	Leu	His	Ser	Ala	Ala	Leu	Asp	Phe	Ser	Pro	Pro	Gly	Thr
				85					90					95	
Glu	Val	Ser	Ala	Leu	Cys	Arg	Gly	Gln	Leu	Pro	Ile	Ser	Val	Thr	Cys
			100					105					110		
Ile	Ala	Asp	Glu	Ile	Gly	Ala	Arg	Trp	Asp	Lys	Leu	Ser	Gly	Asp	Val
		115					120						125		
Leu	Cys	Pro	Cys	Pro	Gly	Arg	Tyr	Leu	Arg	Ala	Gly	Lys	Cys	Ala	Glu
	130					135					140				
Leu	Pro	Asn	Cys	Leu	Asp	Asp	Leu	Gly	Gly	Phe	Ala	Cys	Glu	Cys	Ala
145					150					155					160
Thr	Gly	Phe	Glu	Leu	Gly	Lys	Asp	Gly	Arg	Ser	Cys	Val	Thr	Ser	Gly
			165						170					175	
Glu	Gly	Gln	Pro	Thr	Leu	Gly	Gly	Thr	Gly	Val	Pro	Thr	Arg	Arg	Pro
			180					185					190		
Pro	Ala	Thr	Ala	Thr	Ser	Pro	Val	Pro	Gln	Arg	Thr	Trp	Pro	Ile	Arg
		195					200					205			
Val	Asp	Glu	Lys	Leu	Gly	Glu	Thr	Pro	Leu	Val	Pro	Glu	Gln	Asp	Asn
	210					215					220				
Ser	Val	Thr	Ser	Ile	Pro	Glu	Ile	Pro	Arg	Trp	Gly	Ser	Gln	Ser	Thr
225					230					235				240	
Met	Ser	Thr	Leu	Gln	Met	Ser	Leu	Gln	Ala	Glu	Ser	Lys	Ala	Thr	Ile

					245					250					255	
Thr	Pro	Ser	Gly	Ser	Val	Ile	Ser	Lys	Phe	Asn	Ser	Thr	Thr	Ser	Ser	
			260					265					270			
Ala	Thr	Pro	Gln	Ala	Phe	Asp	Ser	Ser	Ser	Ala	Val	Val	Phe	Ile	Phe	
			275				280						285			
Val	Ser	Thr	Ala	Val	Val	Val	Leu	Val	Ile	Leu	Thr	Met	Thr	Val	Leu	
			290			295					300					
Gly	Leu	Val	Lys	Leu	Cys	Phe	His	Glu	Ser	Pro	Ser	Ser	Gln	Pro	Arg	
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Lys	Glu	Ser	Met	Gly	Pro	Gly	Cys	Asp	Glu							
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<210> 3223

<211> 985

<212> DNA

<213> Homo sapiens

<400> 3223

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180  agcctgcttg  ccacagcccc  ctgcctctac  ctggctctcg  tcctggcccc  gaccaccctg
240  ctggcctcct  atgtgttctt  gggccttggg  gagctgcttc  tgtcctgcaa  ctgggcagtg
300  gttgccgaca  tcctgctgtc  tgtggtggtg  ccagatgcc  gggggacggc  agaggcactt
360  cagatcacgg  tgggccacat  cctgggagac  gctggcagcc  cctatctcac  aggacttacc
420  tctagtgtcc  tgcgggcagg  cgccctgact  cctctgcagc  gcttcgcgag  cctgcagcag
480  agcttcctgt  gctgcgcctt  tgtcatcgcc  ctggggggcg  gctgcttctt  gctgactgcy
540  ctgtacctgg  agagagacga  gacccgggcc  tggcagcctg  tcacagggac  cccagacagc
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<210> 3224

<211> 224
 <212> PRT
 <213> Homo sapiens

<400> 3224
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 35 40 45
 Val Ile Pro Gly Ala Glu Pro Leu Ile Cys Ala Ser Ser Leu Leu Ala
 50 55 60
 Thr Ala Pro Cys Leu Tyr Leu Ala Leu Val Leu Ala Pro Thr Thr Leu
 65 70 75 80
 Leu Ala Ser Tyr Val Phe Leu Gly Leu Gly Glu Leu Leu Leu Ser Cys
 85 90 95
 Asn Trp Ala Val Val Ala Asp Ile Leu Leu Ser Val Val Val Pro Arg
 100 105 110
 Cys Arg Gly Thr Ala Glu Ala Leu Gln Ile Thr Val Gly His Ile Leu
 115 120 125
 Gly Asp Ala Gly Ser Pro Tyr Leu Thr Gly Leu Ile Ser Ser Val Leu
 130 135 140
 Arg Pro Gly Ala Leu Thr Pro Leu Gln Arg Phe Arg Ser Leu Gln Gln
 145 150 155 160
 Ser Phe Leu Cys Cys Ala Phe Val Ile Ala Leu Gly Gly Gly Cys Phe
 165 170 175
 Leu Leu Thr Ala Leu Tyr Leu Glu Arg Asp Glu Thr Arg Ala Trp Gln
 180 185 190
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 195 200 205
 Glu Arg Gln Gly Leu Leu Ser Gly Ala Gly Ala Ser Thr Glu Glu Pro
 210 215 220

<210> 3225
 <211> 506
 <212> DNA
 <213> Homo sapiens

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 aagtgaacc acagcctcaa cccacacaga ggatggaacc accttctgca gctaaaaata
 360
 accacaccgc ctttgagggtg agccacccaa gatgcaggtg gggctgtatg aaactccacg
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 506

<210> 3226
 <211> 137
 <212> PRT
 <213> Homo sapiens

<400> 3226
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 Cys Phe Pro Val Pro Lys Met Pro Val Pro Cys Ala Leu Gly Glu Glu
 35 40 45
 Leu Val Pro Cys His Arg Gly Thr Gly Pro Ala Val Val Trp Pro Ala
 50 55 60
 Gln Pro Gln Gln Gly Glu Val Glu Pro Gln Pro Gln Pro Thr Gln Arg
 65 70 75 80
 Met Glu Pro Pro Ser Ala Ala Lys Asn Asn His Thr Ala Phe Glu Val
 85 90 95
 Ser His Pro Arg Cys Arg Trp Gly Cys Met Lys Leu His Glu His Gly
 100 105 110
 Met Ser Phe Ile Phe Arg Val Pro Arg Gly His Glu Trp Tyr Gln Asp
 115 120 125
 Pro Trp Arg Cys Pro Trp Phe Pro Met
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<210> 3227
 <211> 1623
 <212> DNA
 <213> Homo sapiens

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 540

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 720
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<210> 3228

<211> 385

<212> PRT

<213> Homo sapiens

<400> 3228

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			20					25					30		
Val	Gln	Val	Gly	Asp	Ser	Leu	Arg	Ala	Ser	Thr	Ile	Arg	Lys	Val	Gln
			35				40					45			
Thr	Glu	Ser	Ser	Thr	Gly	Ser	Val	Gly	Ser	Asn	Arg	Val	Arg	Thr	Thr
	50					55				60					
Leu	Thr	Leu	Cys	Val	Glu	Ala	Ile	Asp	Phe	Asp	Ser	Gln	Ala	Cys	Gln

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65          70          75          80
Leu Arg Val Lys Gly Thr Asn Ile Gln Glu Asn Glu Tyr Val Lys Met
          85          90          95
Gly Ala Tyr His Thr Ile Glu Leu Glu Pro Asn Arg Gln Phe Thr Leu
          100          105          110
Ala Lys Lys Gln Trp Asp Ser Val Val Leu Glu Arg Ile Glu Gln Ala
          115          120          125
Cys Asp Pro Ala Trp Ser Ala Asp Val Ala Ala Val Val Met Gln Glu
          130          135          140
Gly Leu Ala His Ile Cys Leu Val Thr Pro Ser Met Thr Leu Thr Arg
          145          150          155          160
Ala Lys Val Glu Val Asn Ile Pro Arg Lys Arg Lys Gly Asn Cys Ser
          165          170          175
Gln His Asp Arg Ala Leu Glu Arg Phe Tyr Glu Gln Val Val Gln Ala
          180          185          190
Ile Gln Arg His Ile His Phe Asp Val Val Lys Cys Ile Leu Val Ala
          195          200          205
Ser Pro Gly Phe Val Arg Glu Gln Phe Cys Asp Tyr Met Phe Gln Gln
          210          215          220
Ala Val Lys Thr Asp Asn Lys Leu Leu Leu Glu Asn Arg Ser Lys Phe
          225          230          235          240
Leu Gln Val His Ala Ser Ser Gly His Lys Tyr Ser Leu Lys Glu Ala
          245          250          255
Leu Cys Asp Pro Thr Val Ala Ser Arg Leu Ser Asp Thr Lys Ala Ala
          260          265          270
Gly Glu Val Lys Ala Leu Asp Asp Phe Tyr Lys Met Leu Gln His Glu
          275          280          285
Pro Asp Arg Ala Phe Tyr Gly Leu Lys Gln Val Glu Lys Ala Asn Glu
          290          295          300
Ala Met Ala Ile Asp Thr Leu Leu Ile Ser Asp Glu Leu Phe Arg His
          305          310          315          320
Gln Asp Val Ala Thr Arg Ser Arg Tyr Val Arg Leu Val Asp Ser Val
          325          330          335
Lys Glu Asn Ala Gly Thr Val Arg Ile Phe Ser Ser Leu His Val Ser
          340          345          350
Gly Glu Gln Leu Ser Gln Leu Thr Gly Val Ala Ala Ile Leu Arg Phe
          355          360          365
Pro Val Pro Glu Leu Ser Asp Gln Glu Gly Asp Ser Ser Ser Glu Glu
          370          375          380
Asp
385

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<210> 3229

<211> 1008

<212> DNA

<213> Homo sapiens

<400> 3229

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cctgcactgg gcgcgcgaga gctgctaggg cggtttctct gcctcgggccc tgttgggag
120
ggcgggctaa ggtgcgcgtg ctcgctgggt ctaacccttc tgttgggcgt ttctgctgag
180

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aggcgggagg cgctgagagt ctgtgcggag gtccgtggac agactgcttt gctcgttggt
 240
 gctcttcgga ggcggcgac cccgaaggcg agctgaaata cggtgcagg ctacaatttg
 300
 cagccgacca ttatggaaga cggcaagcgg gagaggtggc ccaccctcat ggagcgcttg
 360
 tgctcggatg gcttcgcatt tccccaatac cccattaaac cgtatcatct gaagaggatc
 420
 cacagagctg tcttacgtgg taatctggag gaactgaagt accttctgct cacgtattat
 480
 gacatcaata agagagacag gaaggaaagg accgccctac atttggcctg tgccactggc
 540
 caaccggaaa tggtagatct cctggtgtcc agaagatgtg agcttaacct ctgcgaccgt
 600
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 660
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 720
 tacgctgtgt ataatgaaga tacatccatg atagaaaaac ttctttcaca tggtagaaat
 780
 attgaagaat gcagcaagaa tgaatatcag ccactgttac ttgctgtgag tcgaagaaaa
 840
 gtgaaaatgg tggaaatttt attaaagaaa aaagcaaatg taaatgccat tgattatctt
 900
 ggcagatcag cctcatact tgctgttact cttggagaaa aagatatagt cattcttctt
 960
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 1008

<210> 3230

<211> 232

<212> PRT

<213> Homo sapiens

<400> 3230

Met	Glu	Asp	Gly	Lys	Arg	Glu	Arg	Trp	Pro	Thr	Leu	Met	Glu	Arg	Leu
1				5					10					15	
Cys	Ser	Asp	Gly	Phe	Ala	Phe	Pro	Gln	Tyr	Pro	Ile	Lys	Pro	Tyr	His
			20					25					30		
Leu	Lys	Arg	Ile	His	Arg	Ala	Val	Leu	Arg	Gly	Asn	Leu	Glu	Glu	Leu
			35				40						45		
Lys	Tyr	Leu	Leu	Leu	Thr	Tyr	Asp	Ile	Asn	Lys	Arg	Asp	Arg	Lys	
			50			55					60				
Glu	Arg	Thr	Ala	Leu	His	Leu	Ala	Cys	Ala	Thr	Gly	Gln	Pro	Glu	Met
65					70					75				80	
Val	His	Leu	Leu	Val	Ser	Arg	Arg	Cys	Glu	Leu	Asn	Leu	Cys	Asp	Arg
				85					90					95	
Glu	Asp	Arg	Thr	Pro	Leu	Ile	Lys	Ala	Val	Gln	Leu	Arg	Gln	Glu	Ala
			100					105					110		
Cys	Ala	Thr	Leu	Leu	Leu	Gln	Asn	Gly	Ala	Asp	Pro	Asn	Ile	Thr	Asp
			115				120					125			
Val	Phe	Gly	Arg	Thr	Ala	Leu	His	Tyr	Ala	Val	Tyr	Asn	Glu	Asp	Thr
			130				135					140			
Ser	Met	Ile	Glu	Lys	Leu	Leu	Ser	His	Gly	Thr	Asn	Ile	Glu	Glu	Cys

tcagtacgag acaaagtttc ttaaattccc aagaaaaata taagtgttcc acaagtttca
 1140
 cgattctcat tcaagtcctt actgctgtga agaacaaata ccaactgtgc aaattgcaaa
 1200
 actgactaca ttttttggtg tttttttttt tcccccttcc gttctgaata atgggtttta
 1260
 gcgggtccta gtctgctggc attgagctgg ggctgggtca ccaaaccctt cccaaaagga
 1320
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 1367

<210> 3232

<211> 251

<212> PRT

<213> Homo sapiens

<400> 3232

Met	Ser	Asp	Ile	Gly	Asp	Trp	Phe	Arg	Ser	Ile	Pro	Ala	Ile	Thr	Arg
1				5					10					15	
Tyr	Trp	Phe	Ala	Ala	Thr	Val	Ala	Val	Pro	Leu	Val	Gly	Lys	Leu	Gly
			20					25					30		
Leu	Ile	Ser	Pro	Ala	Tyr	Leu	Phe	Leu	Trp	Pro	Glu	Ala	Phe	Leu	Tyr
		35					40					45			
Arg	Phe	Gln	Ile	Trp	Arg	Pro	Ile	Thr	Ala	Thr	Phe	Tyr	Phe	Pro	Val
	50				55					60					
Gly	Pro	Gly	Thr	Gly	Phe	Leu	Tyr	Leu	Val	Asn	Leu	Tyr	Phe	Leu	Tyr
65				70					75					80	
Gln	Tyr	Ser	Thr	Arg	Leu	Glu	Thr	Gly	Ala	Phe	Asp	Gly	Arg	Pro	Ala
			85					90					95		
Asp	Tyr	Leu	Phe	Met	Leu	Leu	Phe	Asn	Trp	Ile	Cys	Ile	Val	Ile	Thr
		100						105					110		
Gly	Leu	Ala	Met	Asp	Met	Gln	Leu	Met	Ile	Pro	Leu	Ile	Met	Ser	
		115				120						125			
Val	Leu	Tyr	Val	Trp	Ala	Gln	Leu	Asn	Arg	Asp	Met	Ile	Val	Ser	Phe
	130				135					140					
Trp	Phe	Gly	Thr	Arg	Phe	Lys	Ala	Cys	Tyr	Leu	Pro	Trp	Val	Ile	Leu
145				150					155					160	
Gly	Phe	Asn	Tyr	Ile	Ile	Gly	Gly	Ser	Val	Ile	Asn	Glu	Leu	Ile	Gly
			165					170					175		
Asn	Leu	Val	Gly	His	Leu	Tyr	Phe	Phe	Leu	Met	Phe	Arg	Tyr	Pro	Met
		180					185						190		
Asp	Leu	Gly	Gly	Arg	Asn	Phe	Leu	Ser	Thr	Pro	Gln	Phe	Leu	Tyr	Arg
	195					200						205			
Trp	Leu	Pro	Ser	Arg	Arg	Gly	Gly	Val	Ser	Gly	Phe	Gly	Val	Pro	Pro
	210					215					220				
Ala	Ser	Met	Arg	Arg	Ala	Ala	Asp	Gln	Asn	Gly	Gly	Gly	Gly	Arg	His
225				230						235				240	
Asn	Trp	Gly	Gln	Gly	Phe	Arg	Leu	Gly	Asp	Gln					
			245					250							

<210> 3233

<211> 975

<212> DNA

<213> Homo sapiens

<400> 3233

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 120
 atgacaattt tcacatctcc cgcttcccc tccaaagagt tctactgtc caattctgaa
 180
 aaggaacgtt atgaaaaaga attcagccaa gaaagacaac aagaaattt gagaagagca
 240
 gcaagagctt tacctatcta taccacatca gcttcaaaaa ctatcagata ttgtgaaaaa
 300
 tgtcagctga ttaaacctga tcggggcgcat cactgctcag cctgtgactc atgtattctt
 360
 aagatggatc atccctgtcc ttgggtgaat aactgtgtgg gattttctaa ttacaaattc
 420
 ttctgtctgt ttttattgta ttccctatta tattgccttt tcgtggccgc acagttttag
 480
 agtacttaaa aaattttgga cgaaagaacc gacccaaacc cgggccaaaa ttccacgtac
 540
 tttttctttt tctttgtgtc tgcaatgttc ttcacagcg tcctctcact ttccagctac
 600
 cactgctggc tttaaacagc attgtccaca gctccgtctg cagggtcagg gcatggcctc
 660
 tctccgtgtt cctgtgaaga gccttcattg gaatcatccc gggacatata gcttgaatgt
 720
 gctgtctggc tagccccctcc acaagtcggt cactctgcac aaggaatccg agagctcatc
 780
 aaggatcagc acggtctggg gcccggtgg ggtggaacac gcacggtcca caagcaattc
 840
 tgtctttctc aaggcttttt cttgtgcagt atgaaatcct tcatatttca tatgaagtat
 900
 gtgccttctg gggcactgag ctcaggaact ccaaaaagac cccttcgggc cggatcccgg
 960
 cttcaaggct gcccc
 975

<210> 3234

<211> 159

<212> PRT

<213> Homo sapiens

<400> 3234

Xaa	Ala	Tyr	Val	Val	Glu	Leu	Cys	Val	Phe	Thr	Ile	Phe	Gly	Asn	Glu
1				5					10					15	
Glu	Asn	Gly	Lys	Thr	Val	Val	Tyr	Leu	Val	Ala	Phe	His	Leu	Phe	Phe
			20					25					30		
Val	Met	Phe	Val	Trp	Ser	Tyr	Trp	Met	Thr	Ile	Phe	Thr	Ser	Pro	Ala
			35				40					45			
Ser	Pro	Ser	Lys	Glu	Phe	Tyr	Leu	Ser	Asn	Ser	Glu	Lys	Glu	Arg	Tyr
			50			55					60				
Glu	Lys	Glu	Phe	Ser	Gln	Glu	Arg	Gln	Gln	Glu	Ile	Leu	Arg	Arg	Ala
65					70					75				80	
Ala	Arg	Ala	Leu	Pro	Ile	Tyr	Thr	Thr	Ser	Ala	Ser	Lys	Thr	Ile	Arg

				85				90					95			
Tyr	Cys	Glu	Lys	Cys	Gln	Leu	Ile	Lys	Pro	Asp	Arg	Ala	His	His	Cys	
			100					105					110			
Ser	Ala	Cys	Asp	Ser	Cys	Ile	Leu	Lys	Met	Asp	His	Pro	Cys	Pro	Trp	
			115				120					125				
Val	Asn	Asn	Cys	Val	Gly	Phe	Ser	Asn	Tyr	Lys	Phe	Phe	Leu	Leu	Phe	
			130			135					140					
Leu	Leu	Tyr	Ser	Leu	Leu	Tyr	Cys	Leu	Phe	Val	Ala	Ala	Gln	Phe		
145					150					155						

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<210> 3235
<211> 551
<212> DNA
<213> Homo sapiens
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<400> 3235
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gaagccagaa ggcagcttcg agatgaatct cagttacgac aggatgtaga gaatgagcta
120
gcagtacaag ttagtatgaa gcatgagatt gaacttgcca tgaagttgct ggagaaagat
180
atccatgaga aacaagatac tctgataggc cttcgacaac aactagagga agttaaaagca
240
attaacatag agatgtatca aaagttgcag ggttctgaag atggcttgaa agaaaaaaat
300
gaaataattg cccgactaga agaaaaaacc aataaaatta ctgcagccat gaggcagctg
360
gaacaaagat tgcagcaagc agagaaggcg caaatggaag ctgaagatga ggatgagaaa
420
tatctacaag aatgtctcag taaatctgat agtctgcaga aacaaatctc ccaaaggag
480
aaacagctgg tgcaactgga aactgacttg aagattgaga aggaatggag gcagactttg
540
caggaagatc t
551
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<210> 3236
<211> 183
<212> PRT
<213> Homo sapiens
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<400> 3236															
Xaa	Glu	Thr	Glu	Leu	Gln	Thr	Tyr	Lys	His	Ser	Arg	Gln	Gly	Leu	Asp
1				5					10					15	
Glu	Met	Tyr	Asn	Glu	Ala	Arg	Arg	Gln	Leu	Arg	Asp	Glu	Ser	Gln	Leu
			20					25					30		
Arg	Gln	Asp	Val	Glu	Asn	Glu	Leu	Ala	Val	Gln	Val	Ser	Met	Lys	His
		35				40						45			
Glu	Ile	Glu	Leu	Ala	Met	Lys	Leu	Leu	Glu	Lys	Asp	Ile	His	Glu	Lys
	50					55					60				
Gln	Asp	Thr	Leu	Ile	Gly	Leu	Arg	Gln	Gln	Leu	Glu	Glu	Val	Lys	Ala
65					70					75					80
Ile	Asn	Ile	Glu	Met	Tyr	Gln	Lys	Leu	Gln	Gly	Ser	Glu	Asp	Gly	Leu

	85		90		95
Lys Glu Lys	Asn Glu Ile Ile Ala Arg	Leu Glu Glu Lys Thr Asn Lys			
	100	105	110		
Ile Thr Ala	Ala Met Arg Gln Leu Glu Gln Arg	Leu Gln Gln Ala Glu			
	115	120	125		
Lys Ala Gln	Met Glu Ala Glu Asp Glu Lys Tyr	Leu Gln Glu			
	130	135	140		
Cys Leu Ser	Lys Ser Asp Ser Leu Gln Lys Gln Ile Ser	Gln Lys Glu			
145	150	155	160		
Lys Gln Leu	Val Gln Leu Glu Thr Asp Leu Lys Ile Glu Lys	Glu Trp			
	165	170	175		
Arg Gln Thr	Leu Gln Glu Asp				
	180				

<210> 3237

<211> 1323

<212> DNA

<213> Homo sapiens

<400> 3237

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120
gatgaggacc gttgggaagt acggggggac cgcaaggccc ggaagcccct ggtggagaag
180
aagcgacgcg cgcgatcaa cgagagtctt caggagtgtc ggctgctgct ggcgggcgcc
240
gaggtgcagg ccaagctgga gaacgccgaa gtgctggagc tgacgggtgcg gcgggtccag
300
ggtgtgctgc ggggccgggc gcgcgagcgc gagcagctgc aggcggaagc gagcgagcgc
360
ttcgctgccg gctacatcca gtgcatgcac gaggtgcaca cgttcgtgtc cacgtgccag
420
gccatcgacg ctaccgtcgc tgccgagctc ctgaaccatc tgctcgagtc catgccgctg
480
cgtgagggca gcagcttcca ggatctgctg ggggacgccc tggcggggcc acctagagcc
540
cctggacgga gtggctggcc tgcggggggc gctccgggat cccaatacc cagccccccg
600
ggtcctgggg acgacctgtg ctccgacctg gaggaggccc ctgaggctga actgagtcag
660
gctcctgctg aggggcccga cttggtgccc gcagccctgg gcagcctgac cacagcccaa
720
attgcccgga gtgtctggag gccttggtga ccaatgccag ccagagtcct gcgggggtgg
780
gcccggccct ccctggatct cctccctcct ccagggggtt cagatgtggt ggggtagggc
840
cctggaagtc tcccaggtct tccctccctc ctctgatgga tggcttgagc ggcagccctc
900
ggtaaccagc ccagtcaggc ccagccccc tttcttaaga aacttttagg gaccctgcag
960
ctctggagtg ggtggaggga gggagctacg ggcaggagga agaattttgt agagctgcc
1020

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gcgctctccc aggttcaccc acccaggctt caccagccct gtgcgggctc tgggggcaga
 1080
 ggtggcagaa atggtgctgg gcactagtgt tccaggcagc cctgggctaa aaaaaagctt
 1140
 gaacttgcca cttcagcggg gagatgagag gcaggtgcac tcagctgcac tgcccagagc
 1200
 tgtgatgctc tgtacatctt gttttagca cacttgagtt tgtgtattcc attgacatca
 1260
 aatgtgacaa ttttactaaa taaagaattt tggagttagt tacccttgaa aaaaaagtcg
 1320
 acg
 1323

<210> 3238

<211> 249

<212> PRT

<213> Homo sapiens

<400> 3238

Xaa	Leu	Gly	Cys	Asp	Leu	Pro	Arg	Arg	Gly	Val	Cys	Thr	Lys	Ala	Leu
1				5					10					15	
Gly	Ala	Gly	Leu	Arg	Ala	Leu	Trp	Thr	Met	Ala	Pro	Pro	Ala	Ala	Pro
			20					25					30		
Gly	Arg	Asp	Arg	Val	Gly	Arg	Glu	Asp	Glu	Asp	Arg	Trp	Glu	Val	Arg
		35					40					45			
Gly	Asp	Arg	Lys	Ala	Arg	Lys	Pro	Leu	Val	Glu	Lys	Lys	Arg	Arg	Ala
	50					55				60					
Arg	Ile	Asn	Glu	Ser	Leu	Gln	Glu	Leu	Arg	Leu	Leu	Leu	Ala	Gly	Ala
65					70					75				80	
Glu	Val	Gln	Ala	Lys	Leu	Glu	Asn	Ala	Glu	Val	Leu	Glu	Leu	Thr	Val
				85					90					95	
Arg	Arg	Val	Gln	Gly	Val	Leu	Arg	Gly	Arg	Ala	Arg	Glu	Arg	Glu	Gln
			100					105					110		
Leu	Gln	Ala	Glu	Ala	Ser	Glu	Arg	Phe	Ala	Ala	Gly	Tyr	Ile	Gln	Cys
		115					120					125			
Met	His	Glu	Val	His	Thr	Phe	Val	Ser	Thr	Cys	Gln	Ala	Ile	Asp	Ala
	130					135					140				
Thr	Val	Ala	Ala	Glu	Leu	Leu	Asn	His	Leu	Leu	Glu	Ser	Met	Pro	Leu
145					150					155				160	
Arg	Glu	Gly	Ser	Ser	Phe	Gln	Asp	Leu	Leu	Gly	Asp	Ala	Leu	Ala	Gly
			165						170					175	
Pro	Pro	Arg	Ala	Pro	Gly	Arg	Ser	Gly	Trp	Pro	Ala	Gly	Gly	Ala	Pro
		180						185						190	
Gly	Ser	Pro	Ile	Pro	Ser	Pro	Pro	Gly	Pro	Gly	Asp	Asp	Leu	Cys	Ser
	195					200					205				
Asp	Leu	Glu	Glu	Ala	Pro	Glu	Ala	Glu	Leu	Ser	Gln	Ala	Pro	Ala	Glu
	210					215					220				
Gly	Pro	Asp	Leu	Val	Pro	Ala	Ala	Leu	Gly	Ser	Leu	Thr	Thr	Ala	Gln
225					230					235					240
Ile	Ala	Arg	Ser	Val	Trp	Arg	Pro	Trp							
				245											

<210> 3239

<211> 432

<212> DNA

<213> Homo sapiens

<400> 3239

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 120
 ggtttggtcc tccttttctt cgttctgcgg gtccgaagca atgtgctaaa gggtgctatc
 180
 caggaccgcg taggtctcct ttaccagttt gtgggcgcca ccccgtaac accgatgctg
 240
 aacgctgtga atctgtttcc cgtgctgcga gctgtcagcg accaggagag tcaggacggc
 300
 ctctaccaga agtggcagat gatgctggcc tatgcactgc acgtcctccc cttcagcgtt
 360
 gttgccacca tgattttcag cagtgtgtgc tactggacgc tgggcttaca tcctgaggtt
 420
 gcccgattgg gt
 432

<210> 3240

<211> 144

<212> PRT

<213> Homo sapiens

<400> 3240

Lys	Thr	Lys	Asp	Ser	Pro	Gly	Val	Phe	Ser	Lys	Leu	Gly	Val	Leu	Leu
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Arg	Arg	Val	Thr	Arg	Asn	Leu	Val	Arg	Asn	Lys	Leu	Ala	Val	Ile	Thr
			20						25					30	
Arg	Leu	Leu	Gln	Asn	Leu	Ile	Met	Gly	Leu	Phe	Leu	Leu	Phe	Phe	Val
			35						40					45	
Leu	Arg	Val	Arg	Ser	Asn	Val	Leu	Lys	Gly	Ala	Ile	Gln	Asp	Arg	Val
			50						55					60	
Gly	Leu	Leu	Tyr	Gln	Phe	Val	Gly	Ala	Thr	Pro	Tyr	Thr	Gly	Met	Leu
			65						70					75	
Asn	Ala	Val	Asn	Leu	Phe	Pro	Val	Leu	Arg	Ala	Val	Ser	Asp	Gln	Glu
									85					90	
Ser	Gln	Asp	Gly	Leu	Tyr	Gln	Lys	Trp	Gln	Met	Met	Leu	Ala	Tyr	Ala
									100					105	
Leu	His	Val	Leu	Pro	Phe	Ser	Val	Val	Ala	Thr	Met	Ile	Phe	Ser	Ser
									110					115	
Val	Cys	Tyr	Trp	Thr	Leu	Gly	Leu	His	Pro	Glu	Val	Ala	Arg	Leu	Gly
									120					125	
									130					135	
														140	

<210> 3241

<211> 492

<212> DNA

<213> Homo sapiens

<400> 3241

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acgaaataca aaataagagg caggaagagc ccaaagcatc agaaatgtgc cagttataat
 120
 gggccaaaat cccctcttgt gtctccagaa gtatttgaaa aatacgttag gatctgcctc
 180
 acagacatgc tcccaggaca ctcgacagca aggaggtacg gcgggcccag ccagccaagg
 240
 cagaggagga catcactgcc acagcagggg gcctgactgg cagcaaaagg gacgactccg
 300
 gcgaaaagtc agcaggaaac aggacagggg ctggaccaat ggccctccctc agccccacac
 360
 cccacccagg caggagcggg gcctggcccg gggcaggcgg gtgggagagc tcaactgagt
 420
 ggcagcaggg catggcccct gatgctgcag gtacccaggc tgcagctgca gaaacctcag
 480
 tgggaaccca gg
 492

<210> 3242
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 3242
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 Leu Gly Ser Ala Ser Gln Thr Cys Ser Gln Asp Thr Arg Gln Gln Gly
 20 25 30
 Gly Thr Ala Gly Pro Ala Ser Gln Gly Arg Gly Gly His His Cys His
 35 40 45
 Ser Arg Gly Pro Asp Trp Gln Gln Lys Gly Arg Leu Arg Arg Lys Val
 50 55 60
 Ser Arg Lys Gln Asp Arg Gly Trp Thr Asn Gly Leu Pro Gln Pro His
 65 70 75 80
 Thr Pro Pro Arg Gln Glu Arg Cys Leu Ala Arg Gly Arg Arg Val Gly
 85 90 95
 Glu Leu Thr Glu Trp Ala Ala Gly His Gly Pro
 100 105

<210> 3243
 <211> 944
 <212> DNA
 <213> Homo sapiens

<400> 3243
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 60
 ttccccaccc tttgggtctgg ggcaaggagt acttacggag tgacaaaagg aaaagtctgc
 120
 tttgaggcaa aggtaaccca gaatctccca atgaaagaag gctgcacaga ggtctctctc
 180
 cttcgagttg ggtgggtctgt tgatttttcc cgtccacagc ttggtgaaga tgaattctct
 240
 tacggtttcg atggacgagg actcaaggca gaaaatggac aatttgagga atttggccag
 300

acttttgggg agaatgatgt tattggctgc ttgctaatt ttgagactga agaagtagaa
 360
 ctttccttct ccaagaatgg agaagaccta ggtgtggcat tctggatcag caaggattcc
 420
 ctggcagacc gggcccttct accccatgtc ctctgcaaaa attgtgttgt agaattaaac
 480
 ttcggtcaga aggaggagcc cttcttccca ccaccagaag agtttgtgtt cattcatgct
 540
 gtgcctgttg aggagcgtgt acgcactgca gtccttccca agaccataga ggaatgtgag
 600
 gtgattctga tgggtgggact acccggtatct ggaaagaccc agtgggcact gaaatatgca
 660
 aaagaaaacc ctgagaaaag atacaatgtc ctgggagctg agactgtgct caatcaaagt
 720
 aggatgaagg gtctcgagga gccagagatg gaccccaaaa gccgagacct ttagttcag
 780
 caagcctccc agtgccttag taagctggtc cagattgctt cccggacaaa gaggaacttt
 840
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<211> 314

<212> PRT

<213> Homo sapiens

<400> 3244

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<212> DNA

<213> Homo sapiens

<400> 3245

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<213> Homo sapiens

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			20					25					30		
Leu	Ala	Ser	Ile	Ile	Ala	Ala	Thr	Met	Ala	Arg	Thr	Val	Tyr	Cys	Thr
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Phe	Lys	Thr	Leu	Ser	Arg	Leu	Ala	His	Arg	Leu	Lys	Asn	Ala	Cys	Thr
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145					150					155					160
Asp	Val	Thr	Cys	Glu	Ala	Tyr	Asp	His	Phe	Arg	Ser	Cys	Leu	His	Ala
			165						170					175	
Leu	Glu	Gln	Leu	Thr	Asp	Gly	Lys	Leu	Arg	Phe	Val	Val	Glu	Pro	Val
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<212> DNA

<213> Homo sapiens

<400> 3247

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<212> PRT

<213> Homo sapiens

<400> 3248

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Trp	Ala	Asp	Ile	Phe	Lys	Arg	Phe	Asn	Ser	Gly	Thr	Tyr	Asn	Asn	Gln
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<213> Homo sapiens

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<211> 849

<212> PRT

<213> Homo sapiens

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Met	Asp	Ser	Glu	Met	Arg	Arg	Leu	Gln	Asp	Phe	Asn	Arg	Asp	Leu	Arg	
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Glu	Arg	Leu	Glu	Ser	Ala	Asn	Arg	Arg	Leu	Ala	Ser	Lys	Thr	Gln	Glu	
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Ala	Gln	Ala	Gly	Ser	Gln	Asp	Met	Val	Ala	Lys	Leu	Leu	Ala	Gln	Ser	
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Tyr	Glu	Gln	Gln	Gln	Glu	Gln	Glu	Lys	Leu	Glu	Arg	Glu	Met	Ala	Leu	
			500					505					510			
Leu	Arg	Gly	Ala	Ile	Glu	Asp	Gln	Arg	Arg	Ala	Glu	Leu	Leu	Glu	Glu	
		515					520					525				
Gln	Ala	Leu	Gly	Asn	Ala	Gln	Gly	Arg	Ala	Ala	Arg	Ala	Glu	Glu	Glu	
	530					535					540					
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Ala	Leu	Gly	Gln	Leu	Gln	Ala	Ala	Cys	Glu	Lys	Arg	Glu	Gln	Leu	Glu	
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			580					585					590			
Gln	Gln	Arg	Gln	Ala	Gly	Ala	Pro	Gly	Gly	Ser	Ser	Gly	Ser	Gly	Gly	
		595					600					605				
Ser	Pro	Glu	Leu	Ser	Ala	Leu	Arg	Leu	Ser	Glu	Gln	Leu	Arg	Glu	Lys	
	610					615					620					
Glu	Glu	Gln	Ile	Leu	Ala	Leu	Glu	Ala	Asp	Met	Thr	Lys	Trp	Glu	Gln	
625					630					635					640	
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<210> 3251
<211> 2595
<212> DNA
<213> Homo sapiens
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1140
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1200
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2280
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2595

<210> 3252
 <211> 254
 <212> PRT
 <213> Homo sapiens

<400> 3252
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 35 40 45
 Leu Glu Asp Val Ser Arg Gly Gly Ser Pro Phe Ala Ile Val Ile Thr
 50 55 60
 Gln Gln His Gln Ile His Arg Ser Cys Thr Val Asn Ile Met Phe Gly
 65 70 75 80
 Thr Pro Gln Glu His Arg Asn Met Pro Gln Ala Asp Ala Met Val Leu
 85 90 95
 Val Ala Arg Asn Tyr Glu Arg Tyr Lys Asn Glu Cys Arg Glu Lys Glu
 100 105 110
 Arg Glu Glu Ile Ala Arg Gln Ala Ala Lys Met Ala Asp Glu Ala Ile
 115 120 125
 Leu Gln Glu Arg Glu Arg Gly Gly Pro Glu Glu Gly Val Arg Gly Gly
 130 135 140
 His Pro Pro Ala Ile Gln Ser Leu Ile Asn Leu Leu Ala Asp Asn Arg
 145 150 155 160
 Tyr Leu Thr Ala Glu Glu Thr Asp Lys Ile Ile Asn Tyr Leu Arg Glu
 165 170 175
 Arg Lys Glu Arg Leu Met Arg Ser Ser Thr Asp Ser Leu Pro Gly Glu
 180 185 190
 Leu Arg Gly Arg Pro Arg Pro Asp Phe Pro Pro Thr Thr Arg Gly Asp
 195 200 205
 Leu Gly Cys Leu Ala Glu Asp Thr Ala Lys Leu Pro Thr Ala Pro Glu
 210 215 220
 Arg Pro Ser Ala Pro Leu Cys Tyr Thr His Ser Ile Cys Thr Pro His
 225 230 235 240
 Leu Pro Ala Arg Ala Ser Gly Gln Asn Pro Gln Pro Leu Gln
 245 250

<210> 3253
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 <212> DNA
 <213> Homo sapiens

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 120
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 180
 aagacagggg caccctggca gtagcaggta gcctttggcc atctctgcag caggctgggtg
 240

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 360
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 420
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<210> 3254

<211> 180

<212> PRT

<213> Homo sapiens

<400> 3254

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			20					25					30		
Tyr	Ser	Arg	Val	Thr	Pro	Gln	Glu	Gln	Ala	Lys	Leu	Asp	Ala	Gln	Leu
			35				40					45			
Arg	Asp	Lys	Glu	Phe	Tyr	Arg	Pro	Ile	Pro	Asn	Pro	Asn	Pro	Lys	Leu
	50					55					60				
Thr	Asp	Gly	Tyr	Pro	Ala	Phe	Lys	Arg	Pro	His	Met	Thr	Ala	Lys	Asp
65				70					75					80	
Leu	Gly	Leu	Pro	Gly	Phe	Phe	Pro	Ser	Gln	Glu	His	Glu	Ala	Thr	Arg
			85					90						95	
Glu	Asp	Glu	Arg	Lys	Phe	Thr	Ser	Thr	Cys	His	Phe	Thr	Tyr	Pro	Ala
			100				105						110		
Ser	His	Asp	Leu	His	Leu	Ala	Gln	Gly	Asp	Pro	Asn	Gln	Val	Leu	Gln
		115				120						125			
Ser	Ala	Asp	Phe	Pro	Cys	Leu	Val	Asp	Pro	Lys	His	Gln	Pro	Ala	Ala
	130					135					140				
Glu	Met	Ala	Lys	Gly	Tyr	Leu	Leu	Leu	Pro	Gly	Cys	Pro	Cys	Leu	His
145				150					155					160	
Cys	His	Ile	Val	Lys	Val	Pro	Ile	Leu	Asn	Arg	Trp	Gly	Pro	Leu	Met
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Pro	Phe	Tyr	Gln												
			180												

<210> 3255

<211> 724

<212> DNA

<213> Homo sapiens

<400> 3255

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 120
 ggactcatgt cgaggtcggg gaaggatgta aaacccggac ggacatcact gtaggccgca
 180
 cctgctgaga ggccagagct gcctccttga gagtgaagtt gtttacagac aagagaagag
 240
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 300
 gaatatgagg ggggtcggaa tgaggcaggc gaaaggcacg gacgtgggag ggcacggcta
 360
 cccaacgggg acacctacga agggagctac gaattcggta aaagacatgg ccaggggatc
 420
 tacaaattta aaaatggtgc tcgatatac ggagaatatg ttagaaataa aaagcacggt
 480
 caaggcactt ttatatatcc agatggatcc agatatgaag gagagtgggc aaatgacctg
 540
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 600
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<210> 3256

<211> 169

<212> PRT

<213> Homo sapiens

<400> 3256

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			20					25					30		
Gly	Arg	Asn	Glu	Ala	Gly	Glu	Arg	His	Gly	Arg	Gly	Arg	Ala	Arg	Leu
		35					40					45			
Pro	Asn	Gly	Asp	Thr	Tyr	Glu	Gly	Ser	Tyr	Glu	Phe	Gly	Lys	Arg	His
	50					55				60					
Gly	Gln	Gly	Ile	Tyr	Lys	Phe	Lys	Asn	Gly	Ala	Arg	Tyr	Ile	Gly	Glu
65					70				75					80	
Tyr	Val	Arg	Asn	Lys	Lys	His	Gly	Gln	Gly	Thr	Phe	Ile	Tyr	Pro	Asp
			85					90						95	
Gly	Ser	Arg	Tyr	Glu	Gly	Glu	Trp	Ala	Asn	Asp	Leu	Arg	His	Gly	His
			100					105					110		
Gly	Val	Tyr	Tyr	Tyr	Ile	Asn	Asn	Asp	Thr	Tyr	Thr	Gly	Glu	Trp	Phe
			115				120					125			
Ala	His	Gln	Arg	His	Gly	Gln	Gly	Thr	Tyr	Leu	Tyr	Ala	Glu	Thr	Gly
	130					135					140				
Ser	Lys	Tyr	Val	Gly	Thr	Trp	Val	Asn	Gly	Gln	Gln	Glu	Gly	Thr	Ala
145					150					155					160
Glu	Leu	Ile	His	Leu	Asn	His	Arg	Tyr							

165

<210> 3257
 <211> 368
 <212> DNA
 <213> Homo sapiens

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 240
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<210> 3258
 <211> 122
 <212> PRT
 <213> Homo sapiens

<400> 3258
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 Ser Thr Ala Thr Lys Ser Glu Thr Ser Glu Asp Ile Ser Gln Thr Ser
 35 40 45
 Lys Tyr Ser Pro Ile Tyr Ser Pro Asp Pro Tyr Tyr Ala Ser Glu Ser
 50 55 60
 Glu Tyr Trp Thr Tyr His Gly Ser Pro Lys Val Pro Arg Ala Arg Arg
 65 70 75 80
 Phe Ser Ser Gly Gly Glu Glu Asp Asp Phe Asp Arg Ser Met His Lys
 85 90 95
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 100 105 110
 Arg Ser Ser Ser Tyr Ala Asp Pro Trp Arg
 115 120

<210> 3259
 <211> 747
 <212> DNA
 <213> Homo sapiens

<400> 3259
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 120
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 180
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 240
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 300
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 420
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<210> 3260

<211> 197

<212> PRT

<213> Homo sapiens

<400> 3260

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Leu	Val	His	Leu	Met	Thr	Ser	Asn	Pro	Lys	Ile	Leu	Tyr	Ala	Pro	Ala	20	25	30	
Gly	Ser	Glu	Val	Asp	Arg	Val	Ile	Leu	Lys	Ala	Asn	Glu	Thr	Phe	Ala	35	40	45	
Phe	Val	Gly	Asn	Val	Thr	His	Tyr	Ala	Gln	Val	Trp	Leu	Asn	Ile	Ser	50	55	60	
Ala	Glu	Ile	Arg	Ser	Phe	Leu	Glu	Gln	Gly	Arg	Leu	Gln	Gln	His	Leu	65	70	75	80
Arg	Trp	Leu	Gln	Gln	Tyr	Val	Ala	Glu	Leu	Arg	Leu	His	Pro	Glu	Ala	85	90	95	
Leu	Asn	Leu	Ser	Leu	Asp	Glu	Leu	Pro	Pro	Ala	Leu	Arg	Gln	Asp	Asn	100	105	110	
Phe	Ser	Leu	Pro	Ser	Gly	Met	Ala	Leu	Leu	Gln	Gln	Leu	Asp	Thr	Ile	115	120	125	
Asp	Asn	Ala	Ala	Cys	Gly	Trp	Ile	Gln	Phe	Met	Ser	Lys	Val	Ser	Val	130	135	140	
Asp	Ile	Phe	Lys	Gly	Phe	Pro	Asp	Glu	Glu	Ser	Ile	Val	Asn	Tyr	Thr	145	150	155	160
Leu	Asn	Gln	Ala	Tyr	Gln	Asp	Asn	Val	Thr	Val	Phe	Ala	Ser	Val	Ile	165	170	175	
Phe	Gln	Thr	Arg	Lys	Asp	Gly	Ser	Ser	Arg	Leu	Thr	Cys	Thr	Thr	Arg				

180
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 195

 <210> 3261
 <211> 1323
 <212> DNA
 <213> Homo sapiens

 <400> 3261
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 420
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 480
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 1320

aaa
1323

<210> 3262
<211> 81
<212> PRT
<213> Homo sapiens

<400> 3262
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20 25 30
Glu Phe Asp Lys Phe Leu Glu Glu Arg Ala Lys Ala Ala Glu Met Val
35 40 45
Pro Asp Leu Pro Ser Pro Pro Met Glu Ala Pro Ala Pro Ala Ser Asn
50 55 60
Pro Ser Gly Arg Lys Lys Pro Glu Arg Ser Glu Asp Ala Leu Phe Ala
65 70 75 80
Leu

<210> 3263
<211> 1128
<212> DNA
<213> Homo sapiens

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180
gccaggaaac ctggccagaa ggagaagaga gtgcgggccc aggagaagca acaagccaag
240
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300
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420
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gaggccccc aggagaaggc ggaggacaag ccagcacccg atctctcagc cccagtgaat
720
ggcgaggcca catcacagaa gggggagagc gcagaggaca aggagcacga ggagggtcgg
780

gactcggagg aggggccaag gtgtggctcc tctgaagacc tgcacgacag cgtacgggag
 840
 ggtccccgacc tggacaggcc tgggagcgac cggcaggagc gcgagagggc acgggggggac
 900
 tcggaggccc tggacgagga gagctgagcc gcgggcagcc agggccagcc cccgcccag
 960
 ctcaggctgc cctctcctt ccccggtcg caggagagca gagcagagaa ctgtggggaa
 1020
 cgctgtgctg tttgtatttg ttcccttggg ttttttttct ctgcctaatt tctgtgattt
 1080
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 1128

<210> 3264

<211> 308

<212> PRT

<213> Homo sapiens

<400> 3264

Ser	Arg	Tyr	Arg	Arg	Ser	Ser	Gly	Asp	Glu	Leu	Arg	Glu	Asp	Asp	Glu
1				5					10					15	
Pro	Val	Lys	Lys	Arg	Gly	Arg	Lys	Gly	Arg	Gly	Arg	Gly	Pro	Pro	Ser
			20					25					30		
Ser	Ser	Asp	Ser	Glu	Pro	Glu	Ala	Glu	Leu	Glu	Arg	Glu	Ala	Lys	Lys
		35					40					45			
Ser	Ala	Lys	Lys	Pro	Gln	Ser	Ser	Ser	Thr	Glu	Pro	Ala	Arg	Lys	Pro
	50					55					60				
Gly	Gln	Lys	Glu	Lys	Arg	Val	Arg	Pro	Glu	Glu	Lys	Gln	Gln	Ala	Lys
65					70					75					80
Pro	Val	Lys	Val	Glu	Arg	Thr	Arg	Lys	Arg	Ser	Glu	Gly	Phe	Ser	Met
				85					90					95	
Asp	Arg	Lys	Val	Glu	Lys	Lys	Lys	Glu	Pro	Ser	Val	Glu	Glu	Lys	Leu
			100					105					110		
Gln	Lys	Leu	His	Ser	Glu	Ile	Lys	Phe	Ala	Leu	Lys	Val	Asp	Ser	Pro
	115						120					125			
Asp	Val	Lys	Gly	Cys	Leu	Asn	Ala	Leu	Glu	Glu	Leu	Gly	Thr	Leu	Gln
	130					135					140				
Val	Thr	Ser	Gln	Ile	Leu	Gln	Lys	Asn	Thr	Asp	Val	Val	Ala	Thr	Leu
145					150					155					160
Lys	Lys	Ile	Arg	Arg	Tyr	Lys	Ala	Asn	Lys	Asp	Val	Met	Glu	Lys	Ala
			165					170					175		
Ala	Glu	Val	Tyr	Thr	Arg	Leu	Lys	Ser	Arg	Val	Leu	Gly	Pro	Lys	Ile
			180					185					190		
Glu	Ala	Val	Gln	Lys	Val	Asn	Lys	Ala	Gly	Met	Glu	Lys	Glu	Lys	Ala
	195						200					205			
Glu	Glu	Lys	Leu	Ala	Gly	Glu	Glu	Leu	Ala	Gly	Glu	Glu	Ala	Pro	Gln
	210					215					220				
Glu	Lys	Ala	Glu	Asp	Lys	Pro	Ser	Thr	Asp	Leu	Ser	Ala	Pro	Val	Asn
225					230					235					240
Gly	Glu	Ala	Thr	Ser	Gln	Lys	Gly	Glu	Ser	Ala	Glu	Asp	Lys	Glu	His
			245					250						255	
Glu	Glu	Gly	Arg	Asp	Ser	Glu	Glu	Gly	Pro	Arg	Cys	Gly	Ser	Ser	Glu
			260					265					270		
Asp	Leu	His	Asp	Ser	Val	Arg	Glu	Gly	Pro	Asp	Leu	Asp	Arg	Pro	Gly

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<210> 3265
<211> 524
<212> DNA
<213> Homo sapiens
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<210> 3266
<211> 82
<212> PRT
<213> Homo sapiens
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<210> 3267
<211> 393
<212> DNA
<213> Homo sapiens
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<400> 3267

gtcgaatatg catgcagagt acaggggttta gaacatgaca tggaagagat caatgctcga
60
tggaatacat tgaataaaaa ggctgcacaa agaattgcac agctacagga agctttgttg
120
cattgtggga agtttcaaga tgccttggag ccattgctca gctggttggc agataccgag
180
gagctcatag ccaatcagaa acctccatct gctgagtata aagtggtgaa agcacagatc
240
caagaacaga agttgctcca ggggtccta gatgatcgaa aggccacagt agacatgctt
300
caagcagaag gaggcagaat agcccagtca gcagagctgg ctgatagaga gaaaatcact
360
ggacagctgg agagtcttga aagtagatgg act
393

<210> 3268

<211> 131

<212> PRT

<213> Homo sapiens

<400> 3268

Val	Glu	Tyr	Ala	Cys	Arg	Val	Gln	Gly	Leu	Glu	His	Asp	Met	Glu	Glu
1				5					10					15	
Ile	Asn	Ala	Arg	Trp	Asn	Thr	Leu	Asn	Lys	Lys	Val	Ala	Gln	Arg	Ile
		20						25					30		
Ala	Gln	Leu	Gln	Glu	Ala	Leu	Leu	His	Cys	Gly	Lys	Phe	Gln	Asp	Ala
		35					40					45			
Leu	Glu	Pro	Leu	Leu	Ser	Trp	Leu	Ala	Asp	Thr	Glu	Glu	Leu	Ile	Ala
		50				55					60				
Asn	Gln	Lys	Pro	Pro	Ser	Ala	Glu	Tyr	Lys	Val	Val	Lys	Ala	Gln	Ile
65					70				75					80	
Gln	Glu	Gln	Lys	Leu	Leu	Gln	Arg	Leu	Leu	Asp	Asp	Arg	Lys	Ala	Thr
			85						90					95	
Val	Asp	Met	Leu	Gln	Ala	Glu	Gly	Gly	Arg	Ile	Ala	Gln	Ser	Ala	Glu
			100					105						110	
Leu	Ala	Asp	Arg	Glu	Lys	Ile	Thr	Gly	Gln	Leu	Glu	Ser	Leu	Glu	Ser
		115					120						125		
Arg	Trp	Thr													
		130													

<210> 3269

<211> 1423

<212> DNA

<213> Homo sapiens

<400> 3269

ctgtatcaaa aataatagta acttttttgaa tatacacaat ttatctagaa tctattttcc
60
tttgaagctg taacttttatg agcgattatt tactaccttt gagaaatgtg ttttagtata
120
aaatatagga tgtggaagcg aaaaaatata tgggtagcaa gtgaggtgta ctcaaaaata
180

agcaaaagtc acgtgggtct gatttttatac cctcgctgga aagcttggtc tcagacacac
 240
 tgttactgca agtgtgtgtg aggggggaaac tctcacacac tttgcagttg aggacagggc
 300
 tagactttga ggtggaccct ggctcccagg gctgtgtact cccagcccgt gtttctcttt
 360
 tgctcagact gaacaagtgg aacgaaatta cattaagaa aagaaggcag cagtgaagaa
 420
 atttgaagac aagaaggttg agctgaaaga gaacctgatt gctgagctag aagaaaagaa
 480
 gaaaatgatt gaaaacgaaa tgctgacaat ggaactgaat ggagattcta tggaggtgaa
 540
 acctatcatg accagaaagt tgcggaggcg accaaatgat cccgtcccca tcccagacaa
 600
 gaggaggaaa cctgctccag cccagctaaa ctatttgta acagatgaac agatcatgga
 660
 ggatctgaga acattaaata agcttaagtc acccaagaga ccagcatctc catcctctcc
 720
 tgagcacttg cctgcaacac ccgcggaatc tccagcacag agatttgagg cgcggataga
 780
 agatggcaaa ctgtattatg acaaaagatg gtaccacaag agccaggcca tctatctgga
 840
 gtcaaaggac aaccagaaac tgagctgcgt gatcagttct gtaggagcca atgagatctg
 900
 ggtgaggaag acaagtgaac gcaccaagat gaggatctac ctgggtcagc ttcagcgagg
 960
 gctcttcgtg atccgccggc gctcagctgc ttgactttct acagtgtctc tctcttgacc
 1020
 ctttttctgg agtgggtttt atttttgttt tgtttcgttt tctccttaac agaaaaatgt
 1080
 taacttactg ggaatagcta ctcagccttg gaaatggaga gcactgcagt gaattcttta
 1140
 gggcactttt gtggccggat gcttccaact ttgtcagttc tttctgcctc aacttcttcc
 1200
 agacatcagt caccatgaga ctgttttact ttcaggcgta ttgggggggt tgatttactt
 1260
 tccttttatt tctttatttt ttgcttatac ttgtttttga aaacctctc tgagtttgaa
 1320
 gggacagcta tttttattga ttatctttaa gtctctctac catggagaag agcaggaagg
 1380
 gatacactct ccagtgcatt ttcattgttt gaatcggatt agt
 1423

<210> 3270

<211> 169

<212> PRT

<213> Homo sapiens

<400> 3270

Met	Ile	Glu	Asn	Glu	Met	Leu	Thr	Met	Glu	Leu	Asn	Gly	Asp	Ser	Met
1				5					10					15	
Glu	Val	Lys	Pro	Ile	Met	Thr	Arg	Lys	Leu	Arg	Arg	Arg	Pro	Asn	Asp
			20						25					30	
Pro	Val	Pro	Ile	Pro	Asp	Lys	Arg	Arg	Lys	Pro	Ala	Pro	Ala	Gln	Leu

```

      35      40      45
Asn Tyr Leu Leu Thr Asp Glu Gln Ile Met Glu Asp Leu Arg Thr Leu
  50      55      60
Asn Lys Leu Lys Ser Pro Lys Arg Pro Ala Ser Pro Ser Ser Pro Glu
  65      70      75      80
His Leu Pro Ala Thr Pro Ala Glu Ser Pro Ala Gln Arg Phe Glu Ala
      85      90      95
Arg Ile Glu Asp Gly Lys Leu Tyr Tyr Asp Lys Arg Trp Tyr His Lys
      100      105      110
Ser Gln Ala Ile Tyr Leu Glu Ser Lys Asp Asn Gln Lys Leu Ser Cys
      115      120      125
Val Ile Ser Ser Val Gly Ala Asn Glu Ile Trp Val Arg Lys Thr Ser
      130      135      140
Asp Ser Thr Lys Met Arg Ile Tyr Leu Gly Gln Leu Gln Arg Gly Leu
  145      150      155      160
Phe Val Ile Arg Arg Arg Ser Ala Ala
      165

```

<210> 3271

<211> 464

<212> DNA

<213> Homo sapiens

<400> 3271

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tcatgagcag ggcccaattc tggcttctct gtggtcgcca tccatgtgct gggcgctcact
  60
gaaggcactg gggatacagc cgagcacaag atggacagag atccctggcc cctcggagca
  120
ggcagtctgt ggctctggcc cctccagttc cttgtcacca ggagataggc aatgcagctg
  180
atgagaaggg ccccggcagc aagagatcca atgatggtgg ccgccaggat cccagcgttg
  240
gtgggcaggt gtgtactggg cagctcctta ttcttttcag ctacctggac ctcagtcttg
  300
gccttcatag tccattcaga gttgatggta atggctactt ggtaggtgcc actgtctgta
  360
ggctggggcg cgcgcagcag catggaacca ttggggaagc ccacgatgtc tcgctgtccc
  420
atggcactgc catccctctg aggcggttgt atccccaggg atgt
  464

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<210> 3272

<211> 140

<212> PRT

<213> Homo sapiens

<400> 3272

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Met Gly Gln Arg Asp Ile Val Gly Phe Pro Asn Gly Ser Met Leu Leu
  1      5      10      15
Arg Arg Ala Gln Pro Thr Asp Ser Gly Thr Tyr Gln Val Ala Ile Thr
      20      25      30
Ile Asn Ser Glu Trp Thr Met Lys Ala Lys Thr Glu Val Gln Val Ala
      35      40      45
Glu Lys Asn Lys Glu Leu Pro Ser Thr His Leu Pro Thr Asn Ala Gly

```

50		55		60	
Ile Leu Ala Ala Thr	Ile Ile Gly Ser Leu	Ala Ala Gly Ala Leu Leu			
65	70	75	80		
Ile Ser Cys Ile Ala Tyr	Leu Leu Val Thr Arg	Asn Trp Arg Gly Gln			
	85	90	95		
Ser His Arg Leu Pro Ala	Pro Arg Gly Gln Gly	Ser Leu Ser Ile Leu			
	100	105	110		
Cys Ser Ala Val Ser Pro	Val Pro Ser Val Thr	Pro Ser Thr Trp Met			
	115	120	125		
Ala Thr Thr Glu Lys Pro	Glu Leu Gly Pro Ala His				
	130	135	140		

<210> 3273

<211> 387

<212> DNA

<213> Homo sapiens

<400> 3273

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ngcgcgccag ggatggaaaa ctttattctg tatgaggaga tcggaagagg aagcaagact
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gttgtctata aagggcgacg gaagggaaca atcaattttg tagccattct ttgtactgat
120
aagtgcagaa ggctgaaat aaccaactgg gtccgtctca cccgtgaaat aaaacacaag
180
aatattgtaa cttttcatga atggtatgaa acaagcaacc acctctggct agtgggtggaa
240
ctccgcacag gtggttcctt aaaaacagtt attgctcaag atgaaaacct cccagaagat
300
gttgtgagag aatttggaat tgacctgatt agtggattac atcatcttca taaacttggc
360
attctctttg tgacatttct cctagga
387

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<210> 3274

<211> 129

<212> PRT

<213> Homo sapiens

<400> 3274

Xaa Ala Pro Gly Met Glu Asn Phe Ile Leu Tyr Glu Glu Ile Gly Arg	
1	5 10 15
Gly Ser Lys Thr Val Val Tyr Lys Gly Arg Arg Lys Gly Thr Ile Asn	
	20 25 30
Phe Val Ala Ile Leu Cys Thr Asp Lys Cys Arg Arg Pro Glu Ile Thr	
	35 40 45
Asn Trp Val Arg Leu Thr Arg Glu Ile Lys His Lys Asn Ile Val Thr	
	50 55 60
Phe His Glu Trp Tyr Glu Thr Ser Asn His Leu Trp Leu Val Val Glu	
65	70 75 80
Leu Arg Thr Gly Gly Ser Leu Lys Thr Val Ile Ala Gln Asp Glu Asn	
	85 90 95
Leu Pro Glu Asp Val Val Arg Glu Phe Gly Ile Asp Leu Ile Ser Gly	
	100 105 110
Leu His His Leu His Lys Leu Gly Ile Leu Phe Val Thr Phe Leu Leu	

115 120 125
 Gly

 <210> 3275
 <211> 1266
 <212> DNA
 <213> Homo sapiens

 <400> 3275
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 60
 agaacacatg aaaggaatac atggggaaga aataaagtag aaccaagag ttcttttaag
 120
 ttttctttta tagagacatg aataacagat acactgaagt ataaacaaaa attggcctga
 180
 agcgtccggt ggccggctta gtaggagct atggctaaac atcatcctga ttgatcttt
 240
 tgccgcaagc aggtcgggtg tgccatcgga agactgtgtg aaaaatgtga tggcaagtgt
 300
 gtgatttgtg actcctatgt gcgtccctgc actctggtgc gcatatgtga tgagtgtaac
 360
 tatggatctt accaggggag ctgtgtgatc tgtggaggac ctggggtctc tgatgcctat
 420
 tattgtaagg agtgcaccat ccaggagaag gacagagatg gctgccccaa gattgtcaat
 480
 ctggggagct ctaagacaga cctcttctat gaacgcaaaa aatacggctt caagaagagg
 540
 tgattggtgg gtggccccct cctcccccca acatcagtct gctgcagctg ccagaaaaca
 600
 tgcctactac taccagcaga aaggagcag agcccagagc atcaccagga gtgcctgcta
 660
 gtgtactggc agcttgccac cccctcctct cccttcaccc agacacgtgg tagggatgga
 720
 aaaggattct tcacagagca ctctggcaca ccatatcgga gaaaaattga tagattagtt
 780
 aatggttttt cttgaattcg agaagcatag atctgttctc catattggta tgttctccct
 840
 caaccaagat cttctaaaaa gaaataatat tttagtcttc tgcttgagga actgactgtg
 900
 aagcgacgcc cagtgaaaaa catgatcttg cagcagctct ggtggcagct gtccttgagg
 960
 aacctttggt gtgtggtggg aagctatcag aacaagaaat gtaggcattt cccgtttttt
 1020
 ttgggggggg ggtggggggg cagggtctctg ccctcttgaa aggcatttac ttgtttaaca
 1080
 cttgtccagc tacagtgggg tacagtagct ggctattcac aggcattcat atagcccact
 1140
 agtctcatat ttttttctt ttgagaaatt ggaaactctt tctgttgcta ttatattaat
 1200
 aaagtgggtg tttattttct ggtaaaaaaa aaaaaaaaaa aaaaaaaaaa aaaaaaaaaa
 1260
 aaaaaa
 1266

<210> 3276
 <211> 110
 <212> PRT
 <213> Homo sapiens

<400> 3276
 Met Ala Lys His His Pro Asp Leu Ile Phe Cys Arg Lys Gln Ala Gly
 1 5 10 15
 Val Ala Ile Gly Arg Leu Cys Glu Lys Cys Asp Gly Lys Cys Val Ile
 20 25 30
 Cys Asp Ser Tyr Val Arg Pro Cys Thr Leu Val Arg Ile Cys Asp Glu
 35 40 45
 Cys Asn Tyr Gly Ser Tyr Gln Gly Arg Cys Val Ile Cys Gly Gly Pro
 50 55 60
 Gly Val Ser Asp Ala Tyr Tyr Cys Lys Glu Cys Thr Ile Gln Glu Lys
 65 70 75 80
 Asp Arg Asp Gly Cys Pro Lys Ile Val Asn Leu Gly Ser Ser Lys Thr
 85 90 95
 Asp Leu Phe Tyr Glu Arg Lys Lys Tyr Gly Phe Lys Lys Arg
 100 105 110

<210> 3277
 <211> 1435
 <212> DNA
 <213> Homo sapiens

<400> 3277
 ncctccgtct ccgagaacaa caacaacagc aacaagaaaa caacaataaa aaaaataagg
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 ctgcgtggga ggcagaaaga gctaattgagg ccacgcttgt ccctcggcca ccgtcccacc
 120
 cagacttccg tctccttaaa atgttcatgc gtaagtgcgt ggcagaagcg gctcaagcgc
 180
 actcgtgcgt cattgctgtc agggccgagg gagcgggtgca aggcgcgcgc gtgacgtcag
 240
 gacgccgagg tcaggacgtc gaagocaaag aagaccagag ccagccgggt ggcacagcgg
 300
 tgcgtggcc gtgttgctga tcgcctgggt ggttggtggc gtgtccctgc agcgaaggat
 360
 cctgggtggc agtgaaaaag cagtctgggt cccgaggtcc accccttata cccaagggtc
 420
 cagatggcgg ccaacgtggg tgatcaacgt agcacagatt ggtcttctca gtacagcatg
 480
 gtggctgggg caggccgaga gaatggcatg gagacgccga tgcacgagaa cccggagtgg
 540
 gagaaggccc gtcaggccct ggccagcatc agcaagtcag gagctgccgg cggctctgcc
 600
 aagtccagca gcaatgggccc tgtggccagt gcaagtacgt gtcccaggca gaagcctcag
 660
 ctttgacgca gcagcagtag taccagtggg accagcagta caactatgcc tacccttaca
 720
 gctactacta tcccatgagc atgtaccaga gctatggctc cccttcccag tatgggatgg
 780

ccggctccta tggctagcca caccocagca gccatccgca ccccaacacc aagggactct
 840
 gaaccagccc ccagtccccg gcatggatga gagcatgtcc taccaggctc cccctcagca
 900
 gctgccgtcg gctcagcccc ctcagccctc aaatccccc catggggctc acacgtgaa
 960
 cagtggccct cagcctggga cagctccagc cacacagcan ncagccaggc ggggcccgc
 1020
 acgggccagg cctatgggccc acacacctac accgaacctg ccaagcccaa gaaggccaa
 1080
 cagctgtgga accgcatgaa acccgcccct gggactggag gttcaagtcc aacatccaga
 1140
 agcgaccctt tgctgttacc acccagagct ttggctccaa cgagagggc cagcacagt
 1200
 gttttggccc ccagcccaac cctgagaaag ttcagaacca cagcgggtcc tctgcccggg
 1260
 ggaacctgtc tgggaagccc gatgactggc cccaggacat gaaagagtat gtggagcgct
 1320
 gcttcaccgc ctgtgagtcg gaggaggaca aggaccgcac ggaaaagctg ctcaaggagg
 1380
 tgctgcaggc gcggctgcag gacggctcgg cctataccat tgactggagc cggga
 1435

<210> 3278

<211> 104

<212> PRT

<213> Homo sapiens

<400> 3278

Met	Ala	Ala	Asn	Val	Gly	Asp	Gln	Arg	Ser	Thr	Asp	Trp	Ser	Ser	Gln
1				5				10					15		
Tyr	Ser	Met	Val	Ala	Gly	Ala	Gly	Arg	Glu	Asn	Gly	Met	Glu	Thr	Pro
			20					25					30		
Met	His	Glu	Asn	Pro	Glu	Trp	Glu	Lys	Ala	Arg	Gln	Ala	Leu	Ala	Ser
			35					40					45		
Ile	Ser	Lys	Ser	Gly	Ala	Ala	Gly	Gly	Ser	Ala	Lys	Ser	Ser	Ser	Asn
			50					55					60		
Gly	Pro	Val	Ala	Ser	Ala	Ser	Thr	Cys	Pro	Arg	Gln	Lys	Pro	Gln	Leu
65							70				75				80
Cys	Ser	Ser	Ser	Ser	Thr	Thr	Ser	Gly	Thr	Ser	Ser	Thr	Thr	Met	Pro
							85				90				95
Thr	Pro	Thr	Ala	Thr	Thr	Ile	Pro								
							100								

<210> 3279

<211> 1130

<212> DNA

<213> Homo sapiens

<400> 3279

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 ccaagcagct ccccatcgct ccggaaacgg ctgcagctcc tgcccccaag ccggccccc
 120

cctgagccag aaccaggcac catggtggag aagggatcag atagctcctc agagaagggg
 180
 ggggtgcctg ggacccccag caccagagc ctaggcagcc ggaacttcat ccgcaacagc
 240
 aagaagatgc agagctggta cagtatgctg agccccactt ataagcagcg taatgaggac
 300
 ttccggaaac tgttcagcaa actccccgaa gcagaacgcc tcattgtgga ttactcctgc
 360
 gccctgcagc gtgagatcct gctccagggc cgcctctacc tctctgagaa ctggatctgc
 420
 ttctacagca acatcttccg ctgggagacc acgatctcca tccagctgaa ggaagtgaca
 480
 tgtctgaaga aggaaaagac ggccaagctg atccccaacg ccatccagat ctgcacggag
 540
 agcgagaagc atttcttcac ttcctttggg gcccgtagcc gctgcttcc cctcatcttc
 600
 cgcctctggc agaatgcact gcttgaaaag acgctgagtc cccgcgagct ctggcacctg
 660
 gtgcatcagt gctacggctc agagctgggc ctcaccagtg aggatgagga ctatgtctcc
 720
 cccttgagc tgaacgggtc ggggaccccc aagggaagtgg gagatgtgat cgcctgagc
 780
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 840
 cgtggccatg tcacgccccaa ctttccccga gccagcagcg acgcagacca tggggcagag
 900
 gaggacaagg aggagcaggt agacagccag ccagacgcct cctccagcca gacagtgacc
 960
 ccggtggctg aacccccgag cacagagccc acccagcctg acgggcccac caccctgggc
 1020
 cccttggate tgctgcccag tgaggagcta ttgacagaca caagtaactc ctcttcatcc
 1080
 actggggagg aagcggactt ggctgcctg cttcccgacc tctccggccg
 1130

<210> 3280

<211> 376

<212> PRT

<213> Homo sapiens

<400> 3280

Xaa	Arg	Ala	His	Arg	Ala	Ala	Ser	Met	Phe	Asp	Thr	Thr	Pro	His	Ser
1				5					10					15	
Gly	Arg	Ser	Thr	Pro	Ser	Ser	Ser	Pro	Ser	Leu	Arg	Lys	Arg	Leu	Gln
			20					25					30		
Leu	Leu	Pro	Pro	Ser	Arg	Pro	Pro	Pro	Glu	Pro	Glu	Pro	Gly	Thr	Met
		35					40					45			
Val	Glu	Lys	Gly	Ser	Asp	Ser	Ser	Ser	Glu	Lys	Gly	Gly	Val	Pro	Gly
	50					55					60				
Thr	Pro	Ser	Thr	Gln	Ser	Leu	Gly	Ser	Arg	Asn	Phe	Ile	Arg	Asn	Ser
65				70					75					80	
Lys	Lys	Met	Gln	Ser	Trp	Tyr	Ser	Met	Leu	Ser	Pro	Thr	Tyr	Lys	Gln
			85						90					95	
Arg	Asn	Glu	Asp	Phe	Arg	Lys	Leu	Phe	Ser	Lys	Leu	Pro	Glu	Ala	Glu

100 105 110
 Arg Leu Ile Val Asp Tyr Ser Cys Ala Leu Gln Arg Glu Ile Leu Leu
 115 120 125
 Gln Gly Arg Leu Tyr Leu Ser Glu Asn Trp Ile Cys Phe Tyr Ser Asn
 130 135 140
 Ile Phe Arg Trp Glu Thr Thr Ile Ser Ile Gln Leu Lys Glu Val Thr
 145 150 155 160
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<210> 3281

<211> 842

<212> DNA

<213> Homo sapiens

<400> 3281

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<211> 1012

<212> PRT

<213> Homo sapiens

<400> 3284

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Ala Arg Arg His Phe Gln Arg Leu Arg Asp Ala Ala Ile Val Ile Gln
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Cys Ala Phe Arg Met Leu Lys Ala Arg Arg Glu Leu Lys Ala Leu Arg
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Ile Glu Ala Arg Ser Ala Glu His Leu Lys Arg Leu Asn Val Gly Met
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Glu Asn Lys Val Val Gln Leu Gln Arg Lys Ile Asp Glu Gln Asn Lys
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Glu Phe Lys Thr Leu Ser Glu Gln Leu Ser Val Thr Thr Ser Thr Tyr
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Ser Pro Gly Glu Asp Thr Ser Leu Arg Leu Gln Glu Glu Val Glu Ser
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Val Glu Glu Ile Gly Leu Glu Lys Ala Ala Met Asp Met Thr Val Phe
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Arg Lys Glu Lys Asp Phe Gln Gly Met Leu Glu Tyr His Lys Glu Asp				
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<212> DNA

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<212> PRT

<213> Homo sapiens

<400> 3286

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<210> 3288
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Phe Arg Ala Leu Tyr Phe Gln Leu Gln His Ser Gln Val Phe Thr Ala
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Gln Gly Asp Gly Ala Arg Val Thr Arg Asn Pro Gly Glu Gly Arg Ser
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<400> 3289
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120
cccagcctcc tagcccaata tcagggccgg aggcactgga gaacttcgg ctaaggcagg
180
cctccctcc cattcacaga gccctgccag ggtggctggc aatgggtgaag tccagggcag
240
agatggggac agaggggacg ccttggttc gactctgtgg tgggtggacc acctcctga
300
gaccaggcat ccacgtcggg cagcacatgc taccagtc acagaagagg aaacagaggc
360
tccgagagga agggactgtg tccagggcgg gaccaggcc cttctgcact gggtaaatga
420
gccaaacaca tcacccagc ccttggggag caggagccgg gccttgagg gtgaggagct
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540
ataagctgca attg
554

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<210> 3290
 <211> 129
 <212> PRT
 <213> Homo sapiens

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<400> 3290
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1           5           10           15
Pro Cys Lys Ala Arg Leu Leu Leu Pro Lys Gly Trp Gly Asp Val Leu
      20           25           30
Gly Ser Leu Thr Gln Cys Arg Arg Ala Trp Val Pro Pro Trp Thr Gln

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[illegible]

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<210> 3291
<211> 1075
<212> DNA
<213> Homo sapiens
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180
gcctctgtcc ctccgcactg gctgttcacc tggctagctg tgtccggttc tcaaccggga
240
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300
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900
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960
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1020

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1075

<210> 3292

<211> 102

<212> PRT

<213> Homo sapiens

<400> 3292

Xaa	Xaa	Met	Gly	Cys	Ala	Leu	Arg	Asp	Cys	Arg	Trp	Ser	Ala	Val	Trp
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Val	Ala	Ala	Leu	Gly	Trp	Arg	Pro	Pro	Arg	Val	Pro	Ser	Pro	Ala	Pro
			20					25					30		
Trp	Ser	Ala	Thr	Pro	Gly	Pro	Pro	Trp	Ala	Pro	Ser	Pro	Ala	Thr	Pro
			35				40					45			
Ala	Val	Arg	Leu	Pro	Ala	Pro	Ser	Pro	Thr	Ile	Ala	Ala	Ser	Val	Pro
			50				55				60				
Pro	His	Trp	Leu	Phe	Thr	Trp	Leu	Ala	Val	Ser	Val	Ser	Gln	Pro	Gly
65					70					75				80	
Ser	Glu	Ser	Xaa	Arg	Arg	Pro	Leu	Pro	Pro	Pro	Gln	Leu	Pro	Pro	Pro
				85					90					95	
Thr	Pro	Pro	Ser	Leu	Pro										
				100											

<210> 3293

<211> 2362

<212> DNA

<213> Homo sapiens

<400> 3293

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120
gcaggacgcc gacacctacc cctcagcaga cgccggagag aatgagtag caacaagag
180
cagcggtcag cagtgttcgt gatcctcttt gccctcatca ccatcctcat cctctacagc
240
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300
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360
ctgccctctc ggtgccacca gtgtgtgatt gtcagcagct ccagccacct gctgggcacc
420
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480
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540
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600
atcttctggg ggcccccgag caagatgcag aagccccagg gcagcctcgt gcgtgtgac
660
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720

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780
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900
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1080
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1320
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1680
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1920
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1980
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2100
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2340

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2362

<210> 3294

<211> 353

<212> PRT

<213> Homo sapiens

<400> 3294

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Gln	Arg	Gly	His	Met	Ala	Cys	Ser	Arg	Pro	Pro	Ser	Gln	Cys	Glu	Pro
			20					25				30			
Thr	Ser	Leu	Pro	Pro	Gly	Pro	Pro	Ala	Gly	Arg	Arg	His	Leu	Pro	Leu
		35					40					45			
Ser	Arg	Arg	Arg	Arg	Glu	Met	Ser	Ser	Asn	Lys	Glu	Gln	Arg	Ser	Ala
	50				55						60				
Val	Phe	Val	Ile	Leu	Phe	Ala	Leu	Ile	Thr	Ile	Leu	Ile	Leu	Tyr	Ser
65				70					75					80	
Ser	Asn	Ser	Ala	Asn	Glu	Val	Phe	His	Tyr	Gly	Ser	Leu	Arg	Gly	Arg
				85					90					95	
Ser	Arg	Arg	Pro	Val	Asn	Leu	Lys	Lys	Trp	Ser	Ile	Thr	Asp	Gly	Tyr
			100					105					110		
Val	Pro	Ile	Leu	Gly	Asn	Lys	Thr	Leu	Pro	Ser	Arg	Cys	His	Gln	Cys
		115					120					125			
Val	Ile	Val	Ser	Ser	Ser	Ser	His	Leu	Leu	Gly	Thr	Lys	Leu	Gly	Pro
	130					135					140				
Glu	Ile	Glu	Arg	Ala	Glu	Cys	Thr	Ile	Arg	Met	Asn	Asp	Ala	Pro	Thr
145					150					155					160
Thr	Gly	Tyr	Ser	Ala	Asp	Val	Gly	Asn	Lys	Thr	Thr	Tyr	Arg	Val	Val
				165					170					175	
Ala	His	Ser	Ser	Val	Phe	Arg	Val	Leu	Arg	Arg	Pro	Gln	Glu	Phe	Val
			180					185					190		
Asn	Arg	Thr	Pro	Glu	Thr	Val	Phe	Ile	Phe	Trp	Gly	Pro	Pro	Ser	Lys
		195				200						205			
Met	Gln	Lys	Pro	Gln	Gly	Ser	Leu	Val	Arg	Val	Ile	Gln	Arg	Ala	Gly
	210				215						220				
Leu	Val	Phe	Pro	Asn	Met	Glu	Ala	Tyr	Ala	Val	Ser	Pro	Gly	Arg	Met
225				230					235						240
Arg	Gln	Phe	Asp	Asp	Leu	Phe	Arg	Gly	Glu	Thr	Gly	Lys	Asp	Arg	Glu
			245						250					255	
Lys	Ser	His	Ser	Trp	Leu	Ser	Thr	Gly	Trp	Phe	Thr	Met	Val	Ile	Ala
			260					265					270		
Val	Glu	Leu	Cys	Asp	His	Val	His	Val	Tyr	Gly	Met	Val	Pro	Pro	Asn
	275					280						285			
Tyr	Cys	Ser	Gln	Arg	Pro	Arg	Leu	Gln	Arg	Met	Pro	Tyr	His	Tyr	Tyr
	290					295					300				
Glu	Pro	Lys	Gly	Pro	Asp	Glu	Cys	Val	Thr	Tyr	Ile	Gln	Asn	Glu	His
305					310					315					320
Ser	Arg	Lys	Gly	Asn	His	His	Arg	Phe	Ile	Thr	Glu	Lys	Arg	Val	Phe
				325					330					335	
Ser	Ser	Trp	Ala	Gln	Leu	Tyr	Gly	Ile	Thr	Phe	Ser	His	Pro	Ser	Trp
			340					345					350		

Thr

<210> 3295
 <211> 690
 <212> DNA
 <213> Homo sapiens

<400> 3295
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 120
 gtcagactca ttttcagcct cattaggcag cagacggaga tggagggagg agagcaggag
 180
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 240
 gaactggaaa aataagcctt ccaggattgt ggggagaaag acgctgtggg agaggccagg
 300
 atgctgcatt aggcacagga taacctggga acccaggcac atgggtcctg ctctccgaag
 360
 tctgcaagtc aagaagggaa cagagcacgc cgacctctc cctttcccct ctgtctctct
 420
 tagtggtttt acagtgggta ccctgtcaga aaccagcact gggggccctg ccacccccac
 480
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 540
 ggaggaccac atggatggac acttcttttt cagcaccag ggaccttctt acctttgagt
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 660
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 690

<210> 3296
 <211> 120
 <212> PRT
 <213> Homo sapiens

<400> 3296
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 Leu Trp Glu Arg Pro Gly Cys Cys Ile Arg His Arg Ile Thr Trp Glu
 20 25 30
 Pro Arg His Met Gly Pro Ala Leu Arg Ser Leu Gln Val Lys Lys Gly
 35 40 45
 Thr Glu His Ala Asp Pro Leu Pro Phe Pro Ser Val Ser Leu Ser Gly
 50 55 60
 Phe Thr Val Gly Thr Leu Ser Glu Thr Ser Thr Gly Gly Pro Ala Thr
 65 70 75 80
 Pro Thr Trp Lys Glu Cys Pro Ile Cys Lys Glu Arg Phe Pro Ala Glu
 85 90 95
 Ser Asp Lys Asp Ala Leu Glu Asp His Met Asp Gly His Phe Phe Phe
 100 105 110
 Ser Thr Gln Gly Pro Leu His Leu

115

120

<210> 3297

<211> 3176

<212> DNA

<213> Homo sapiens

<400> 3297

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120
ctgcctcagc ctcccaagta gctgggatta taggtgcccc ccaccctgcc tggctaattt
180
ttgtattttt agtaaagatg gggttttgta acattggcca ggctgggtctc aaactcctga
240
cctcaactga actgccccca tcgggcttcc aaagtgttgg gattagaggt ctgagctact
300
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420
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480
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540
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600
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660
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720
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2100
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2160
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2220
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2280
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2340
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2400
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 3176

<210> 3298

<211> 251

<212> PRT

<213> Homo sapiens

<400> 3298

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Val	Cys	Leu	Cys	Val	Cys	Ala	Leu	Cys	Leu	Cys	Val	Cys	Leu	Cys	Glu	20	25	30	
Cys	Leu	Trp	Val	Ser	Phe	Cys	Val	Cys	Val	Cys	Ile	Cys	Val	Cys	Val	35	40	45	
Xaa	Leu	Cys	Ala	Cys	Met	Cys	Leu	Asp	Val	Cys	Phe	Cys	Met	Cys	Leu	50	55	60	
Cys	Val	Cys	Leu	Tyr	Val	Cys	Ile	Cys	Val	Tyr	Val	Cys	Val	Cys	His	65	70	75	80
Phe	Val	Cys	Phe	Trp	Val	Cys	Leu	Ser	Ala	Cys	Leu	Cys	Ile	Pro	Val	85	90	95	
Ser	Pro	Cys	Val	Cys	Leu	Cys	Val	Cys	Ile	Cys	Xaa	Cys	Leu	Cys	Met	100	105	110	
Cys	Val	Arg	Gly	Cys	Val	Ser	Val	Cys	Val	Cys	Val	Cys	Ile	Glu	Arg	115	120	125	
Glu	Gly	Glu	Arg	Lys	Gly	Ala	Thr	Asp	Gly	Ser	Ala	Trp	Lys	Val	Tyr	130	135	140	
Pro	His	Ser	Gln	Pro	Trp	Glu	Glu	Ser	Val	Asn	Pro	Pro	Thr	Gly	Gln	145	150	155	160
Asp	Gln	Leu	Trp	Trp	Cys	Leu	Ala	Asp	Ser	Gly	Asn	Val	Thr	Phe	His	165	170	175	
Leu	Arg	Met	Gly	Leu	His	Phe	Leu	Gly	Lys	Glu	Cys	Arg	Ser	Trp	Ser	180	185	190	
Leu	Lys	Glu	Cys	Phe	Phe	Phe	Pro	Phe	Val	Ile	Glu	Arg	Ala	Gln	Pro	195	200	205	
Cys	Val	His	Trp	Leu	Thr	Val	Thr	Asn	Leu	Arg	Val	Gly	Asp	Ser	His	210	215	220	
Arg	Glu	Glu	Thr	Glu	Gly	Thr	Ala	Asp	Ser	Glu	Gln	Glu	Ser	Gly	Gly	225	230	235	240
Thr	Ser	Leu	Pro	Leu	Gly	Pro	Asn	Pro	Gln	Leu						245	250		

<210> 3299

<211> 1387

<212> DNA

<213> Homo sapiens

<400> 3299

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120
gtctccacag cgtagcttaa gggggtgcgg ctaagtcag agcctggcag ggagggagta
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agggacttag caggggcgga ggagttcggc ggcggagagg aggggacagg gctgacaggg
240
ataaaggaga taggggatgg agaggaagga agtggacaaa ggccagagga aataccgatg
300
gacctaacgg tagtgaagca ggaaattata gactggccag gtacagaagg caggttggct
360
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600
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<210> 3300

<211> 219

<212> PRT

<213> Homo sapiens

<400> 3300

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<210> 3302

<211> 323

<212> PRT

<213> Homo sapiens

<400> 3302

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          20           25           30
Gln Leu Gln Gly Gly Arg Phe Leu Met Gly Thr Asn Ser Pro Asp Ser
          35           40           45
Arg Asp Gly Glu Gly Pro Val Arg Glu Ala Thr Val Lys Pro Phe Ala
          50           55           60
Ile Asp Ile Phe Pro Val Thr Asn Lys Asp Phe Arg Asp Phe Val Arg
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Glu Lys Lys Tyr Arg Thr Glu Ala Glu Met Phe Gly Trp Ser Phe Val
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Phe Glu Asp Phe Val Ser Asp Glu Leu Arg Asn Lys Ala Thr Gln Pro
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Pro Thr Cys Gly Arg Glu Ser Ser Pro Arg Glu Thr Lys Leu Arg Met
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Tyr Gly Leu Tyr Asp Leu Leu Gly Asn Val Trp Glu Trp Thr Ala Ser
          165          170          175
Pro Tyr Gln Ala Ala Glu Gln Asp Met Arg Val Leu Arg Gly His Pro
          180          185          190
Gly Ser Thr Gln Leu Met Ala Leu Pro Ile Thr Gly Pro Gly Ser Pro
          195          200          205
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          210          215          220
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Gly Gly Asp Lys Glu Lys Ser Leu Leu Gly Ser Leu Ser Phe Pro Gly
          245          250          255
His Val Ala Asn Ser Ala Ile Pro Ser Ser Arg Ala Ser Ala Ser Gly
          260          265          270
Lys Asn Phe Pro Phe Pro Val Ser His Pro Ser Val Ala Gly Ala Ser
          275          280          285
His Gln Gly Arg Arg Gly Leu Ser Leu Leu Cys Phe Gly Glu Gly Ala
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<210> 3303

<211> 699

<212> DNA

<213> Homo sapiens

<400> 3303

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<210> 3304

<211> 233

<212> PRT

<213> Homo sapiens

<400> 3304

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			20					25					30		
Asp	Arg	Arg	Ser	Thr	Glu	Pro	Ser	Val	Thr	Pro	Asp	Leu	Leu	Asn	Phe
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Lys	Lys	Gly	Trp	Leu	Thr	Lys	Gln	Tyr	Glu	Asp	Gly	Gln	Trp	Lys	Lys
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His	Trp	Phe	Val	Leu	Ala	Asp	Gln	Ser	Leu	Arg	Tyr	Tyr	Arg	Asp	Ser
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Val	Ala	Glu	Glu	Ala	Ala	Asp	Leu	Asp	Gly	Glu	Ile	Asp	Leu	Ser	Ala
				85					90					95	
Cys	Tyr	Asp	Val	Thr	Glu	Tyr	Pro	Val	Gln	Arg	Asn	Tyr	Gly	Phe	Gln
			100					105					110		
Ile	His	Thr	Lys	Glu	Gly	Glu	Phe	Thr	Leu	Ser	Ala	Met	Thr	Ser	Gly
			115				120					125			
Ile	Arg	Arg	Asn	Trp	Ile	Gln	Thr	Ile	Met	Lys	His	Val	His	Pro	Thr
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Thr	Ala	Pro	Asp	Val	Thr	Ser	Ser	Leu	Pro	Glu	Glu	Lys	Asn	Lys	Ser
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<210> 3305

<211> 2717

<212> DNA

<213> Homo sapiens

<400> 3305

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<211> 319

<212> PRT

<213> Homo sapiens

<400> 3306

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 35           40           45
Trp His Pro Thr Leu Asn Leu Pro Leu Ser Pro Gln Gly Thr Val Arg
 50           55           60
Thr Ala Val Glu Phe Gln Val Met Thr Gln Thr Gln Ser Leu Ser Phe
 65           70           75           80
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 85           90           95
Gly Leu Asp Leu Ile Ser Val Glu Trp Arg Leu Gln His Lys Gly Arg
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Gly Gln Leu Val Tyr Ser Trp Thr Ala Gly Gln Gly Gln Ala Val Arg
 115          120          125
Lys Gly Ala Thr Leu Xaa Ala Cys Thr Thr Gly His Gly Xaa Arg Asp
 130          135          140
Ala Ser Leu Thr Leu Pro Gly Leu Thr Ile Gln Asp Glu Gly Thr Tyr
 145          150          155          160
Ile Cys Gln Ile Thr Thr Ser Leu Tyr Arg Ala Gln Gln Ile Ile Gln
 165          170          175
Leu Asn Ile Gln Ala Ser Pro Lys Val Arg Leu Ser Leu Ala Asn Glu
 180          185          190
Ala Leu Leu Pro Thr Leu Ile Cys Asp Ile Ala Gly Tyr Tyr Pro Leu
 195          200          205
Asp Val Val Val Thr Trp Thr Arg Glu Glu Leu Gly Gly Ser Pro Ala
 210          215          220
Gln Val Ser Gly Ala Ser Phe Ser Ser Leu Arg Gln Ser Val Ala Gly
 225          230          235          240
Thr Tyr Ser Ile Ser Ser Ser Leu Thr Ala Glu Pro Gly Leu Cys Arg
 245          250          255
Cys His Leu His Leu Pro Gly His Thr His Leu Ser Gly Gly Ala Pro
 260          265          270
Trp Gly Gln His Pro Gly Cys Pro Thr Arg Ala Glu Asn Ser Leu Gly
 275          280          285
Ser His Leu Cys Gln Gln Ser Leu Pro Ser Cys Thr Asp Val Pro Gly
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<210> 3307

<211> 352

<212> DNA

<213> Homo sapiens

<400> 3307

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<210> 3308
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 35 40 45
 Trp Asp Cys Asp Ile Gly Arg Arg Gly Arg Ser Pro Ala Leu Ser Ser
 50 55 60
 Ala Gly Trp Ala Gly Ile His Leu Ala Ala Ser Gln Gly Leu Cys Pro
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 35 40 45
 Gln Thr His Pro Asp Val Pro Val Gly Asp Glu Ser Gln Ala Arg Val
 50 55 60
 Leu His Met Val Gly Asp Lys Pro Val Phe Ser Phe Gln Pro Arg Gly
 65 70 75 80
 His Leu Glu Ile Gly Glu Lys Leu Asp Ile Ile Arg Gln Lys Arg Leu
 85 90 95
 Ser His Val Ser Gly His Arg Ser Tyr Tyr Leu Arg Gly Ala Gly Ala
 100 105 110
 Leu Leu Gln His Gly Leu Val Asn Phe Thr Phe Asn Lys Leu Leu Arg
 115 120 125
 Arg Gly Phe Thr Pro Met Thr Val Pro Asp Leu Leu Arg Gly Ala Val
 130 135 140
 Phe Glu Gly Cys Gly Met Thr Pro Asn Ala Asn Pro Ser Gln Ile Tyr
 145 150 155 160
 Asn Ile Asp Pro Ala Arg Phe Lys Asp Leu Asn Leu Ala Gly Thr Ala
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<210> 3311
 <211> 486
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<213> Homo sapiens

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			20					25					30		
Phe	Tyr	Glu	Asp	Cys	Thr	Ala	Ser	Ile	Trp	Glu	Tyr	Glu	Asp	Asp	Phe
			35				40					45			
Gln	Ile	Gln	Arg	Ser	Pro	Asn	Arg	Trp	Ser	Ser	Val	Phe	Trp	Lys	Val
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<211> 1791

<212> DNA

<213> Homo sapiens

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